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**Reflections on a Wine-Dark Sea: Investigating
Ancient Colour Perception**

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Reflections on a wine-dark sea: investigating ancient colour perception

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Abstract

In this paper I address the issue of ancient colour perception, particularly in Homeric literature, which scholars have debated for hundreds of years. There is a seeming inconsistency in ancient Greek colour terms, with overlapping and 'incorrect' use of adjectives, and so I explore the measures beyond hue that defined ancient perception of the world, using both scientific and literary contemporary texts. I argue that there was no societal deficiency of sight in the ancient world, merely a different use of language to describe vision that used the parameters of hue more flexibly.

The Homeric world is steeped in colour, from the wine-dark sea to rosy-fingered dawn, but the meaning of this colour imagery has been highly contested owing to its inconsistent and perplexing nature. This variation within colour terminology is innate to the Greek language and has divided scholars such as Gladstone and Whitmarsh for hundreds of years. Gladstone (1858) and Platnauer (1921) have argued that the colour experience of the ancients was different to ours today, or that their colour descriptors were simply limited. However, more recent study (such as Sassi (2017) and Whitmarsh (2018)) shows that the Greeks did not limit their colour descriptors to hue, but combined various allusions, shades, and characteristics into every term. At the heart of this issue lies not the limitations of the understanding of the ancient Greeks, but instead our limited modern view of colour. Society today has categorised colours with increasing precision, to the extent that alphanumeric codes can be used to represent certain hues, and without setting aside this rigid view of colour we cannot hope to comprehend ancient colour perception.

Colour perception is an elusive concept in any civilisation; nevertheless, in analysis of colour language, it must be defined as clearly as possible. Nesterov and Federova (2017, p.1-2) distinguish between a 'colour environment', which, although acting as a 'source of emotional reactions', is not changed by the perception of individuals. This is to be differentiated from 'colour culture,' which is the interaction between a society and the colour environment. It could be argued that there is a third layer to these building blocks of colour perception: colour vision, that is, the ability that a group has to see their true 'colour environment'. This could be seen as a subcategory of 'environment', as that which is seen by the viewer is, to them, their 'colour environment'.

Some prominent figures, such as William Gladstone (1858), have argued that the ancient Greeks experienced a different colour vision to the modern individual, which has led to discrepancies between their colour vocabulary and ours. Gladstone argued that the inconsistencies of Homeric colour epithets suggested that they could distinguish very little aside from light and dark, and that as one looks back over the centuries, ability to discriminate between colours becomes 'less and less mature' (1858, p.457); however, there are many limitations to this argument.

One such limitation is the placement of English as the absolute authority on colour definition and description. This phenomenon is noted by Wierzbicka (2008, p.407), who comments on the tendency of English-speaking academia to give 'fundamental status in human cognition' ideas that are 'lexically encoded in English'. Gladstone's (1858, p.459) comparative list of the modern rainbow and colours in Homer, and his comment that at least three of the English colour terms did not have an ancient counterpart, falls into this trap of conflating the existence of concept and terminology. It remains, however, that there is minimal direct correlation between English and Ancient Greek colour terminology, but simply because the Greek language did not capture certain chromic concepts that can be found in English, it cannot be assumed they were not able to perceive it.

Furthermore, an analysis of Aristotle's comments on the rainbow in *Meteorology* Book 3 (Arist. *Mete.* 3.372a) reveals not deficiency of colour perception, as he describes colours that we would recognise in the rainbow, naming red, green, and blue ('φοινικοῦν καὶ πράσινον καὶ ἄλουργόν'), with yellow ('ξανθόν') between the red and green. If we allow for wider criteria for colour terminology, red can be seen as the spectrum from red to yellow, green describing green, and blue the range between blue and indigo. This does not suggest an infancy of colour vision, but a wider range of colours represented by the terminology given.

Another argument, as Allen (1878) notes, is that we have evidence of vibrant shades from Egyptian artifacts, such as sarcophagi, dating from at least five hundred years before the works of Homer. We also have evidence that Greek statues were often painted and gilded, and there is little reason for cultures with an underdeveloped perception of colour to paint their statues and buildings so brightly. One example of



Fig.1.1 'Red-figure vase depicting an artist painting a statue of Hercules, identified by his club and lion-skin cape.' 360-350 BCE (Metropolitan Museum of Art)

evidence for painted statuary is a vase (Fig.1.1), as noted by Mary Beard (2019), which depicts an artist painting his work. It could be argued that ancient cultures did not perceive the same depth of colour in their vibrant decorations, but this argument too is belied by the rich colour language of ancient texts. Purple is often captured in the term πορφύρεος, a rich dark shade described by Pliny as the colour of clotted blood. Blood red is clearly reflected the term ἐρυθρός, and χλωρός used to describe moss greens and skin-yellows (Platnauer, 1921).¹ Gladstone's (1858) assertion that the lack of direct correlation between ancient and modern colour descriptors meant that the Greeks had an underdeveloped comprehension of the colour spectrum excludes the possibility of alternative categorisation of colour, and therefore the conclusion that we have diverged from Ancient Greek 'colour culture', rather than ancient humanity being anatomically underdeveloped, can reasonably be explored.

Ancient 'colour culture' can be accessed through two main literary sources: scientific texts (particularly by Aristotle and Plato) and other literature (such as Homeric epic). It is through these media that four main 'measures' of ancient colour (aside from hue) can be derived, these being 'saliency' (Sassi, 2017), movement, transparency, and brightness.²

Some of these measures are seen in other languages, for example that of the Walpiri people in Australia, who, although they have no direct words for colour, use words like 'kunjuru-kunjuru' ('smoke') to convey the likeness of one object to that of smoke, which may encapsulate its colour (Wierzbicka, 2008, p.410). Wierzbicka (2008, p.411-412) presents some of the measures of visual description of Walpiri, such as 'conspicuousness' in the context of surroundings (described here as saliency), and 'shine' (a subcategory of brightness). Wierzbicka argues that these descriptors, rather than merely portraying colour, convey these other important measures, whereas in this essay the measures are assessed as subcategories of colour.

The first measure, saliency, refers to how 'interesting' a colour is to the viewer, a measure that is reflected in the precision of the language used to represent the colour. Often this saliency results from the vibrancy of the colour. For example, φοινός is consistently used to describe blood red, most commonly bloody stains (Platnauer, 1921), such as in book 16 of the *Iliad* (Hom. *Il.* 16.159), where φοινός is used to describe the bloody stains on the jaws of wolves after a successful hunt. Sassi (2017) comments that red is 'the most salient colour', referring to ἐρυθρός (another term for red or blood red) as 'the first to be defined in terms of hue in any culture'. This can be

clearly seen in Greek colour theory, as Plato named the four most notable colours as 'white, black, red, and 'shining'' (Sassi, 2017)³. However, shades such as green, yellow, and blue are seemingly neglected in ancient Greek (Sassi, 2017), as can be seen in the descriptor χλωρός, which is used to refer to both moss green and the pale yellow of skin (Platnauer, 1921). Perhaps this human fascination with red is not only due to its vibrancy, but its link with blood, a substance unique to violence and pain. Blood is seen frequently in both the ancient and modern world, in hunting, battle, childbirth, and injury, but nevertheless its colour unsettles and entrances humanity. The rich tone of red and its often violent context contribute to its saliency, and therefore it is clearly defined and recognised in the Greek language.

Movement is another vital aspect of Greek colour understanding, and can be seen in the example of ξανθός, which is most notably used to describe the 'blonde' hair of Achilles. However, this term can also be used to describe brown or red shades of hair (Whitmarsh, 2018), and Platnauer (1921) comments on Plato's description of the colour as a mixture of ἐρυθρός and λευκός ('red' and 'white') (Plat. *Tim.* 68b). Another aspect of this descriptor is its etymological link to ξουθός, which often refers to rapid, vibrating movement. Platnauer (1921) notes that Greek authors almost unanimously use ξουθός to describe winged animals, such as Euripides' description of bees in *Iphigenia in Tauris* (Eur. *IT.* 617.) Rapid movement, therefore, such as the fluttering vibrations of wings, can be linked also to the term ξανθός, owing to the etymological link between the two terms. Scholars, such as Whitmarsh (2018), have theorised that the ξανθός of Achilles' hair may allude to his speed in battle, and to his emotional volatility. This volatility can be seen in his fury at Agamemnon's slight against him in taking Briseis, a rage that causes him to refuse to fight for the Greeks.

The importance of movement in Greek colour perception can also be seen in the term πορφύρεος, which is often used to describe the purple hue, brilliance and shifting movement of the sea (Sassi, 2017).

The complex contextual history of πορφύρεος must also be understood to comprehend the allusions and characteristics conveyed by the descriptor. The colour can be tied to Tyrian purple, a dye created from the mucus of murex snails. These snails were collected in 'early spring during the reproductive period', (Jensen, 1963, p.108), and heated until their colour had reached a deep, earthy purple, so deep that the best dyes made through this process were, according to Pliny, almost black, the colour of clotted blood (Plin. *Nat.* 9.62). Owing to the complexity and expense of the manufacturing process, the dye was extremely costly, with the result that only the wealthiest members of society could afford clothes dyed with it. It became a symbol of wealth and power, an idea reflected throughout ancient literature, such as in the case of Agamemnon's return from war. Upon his return, Clytemnestra dyed a set of tapestries with πορφύρεος, an act so lavish it could be compared to lining the walls with gold. She encouraged her husband to walk upon the tapestries, and he refused, suggesting that this is an act that only gods or barbarians would dare carry out (Aesch.

Ag. 914). This suggests that only those with incredible arrogance, power or ignorance could walk on such riches, which reflects the incredible value of the dye. Odysseus' cloak is also dyed purple in the *Odyssey* (Hom. *Od.* 19.190), acting as a symbol of wealth, royalty, power, and hubris, but also a connection with the sea. The link between Odysseus and the sea on which he has been carried for twenty years is conveyed, perhaps, through this shifting, sea-purple of his cloak. Further to this, it could be suggested that this link to the sea also reflects his volatility of character when he returns to Ithaca. Upon his return, he orders the murder of all his wife's suitors and even the slave-girls they slept with (Hom. *Od.* 465-474), showing an unpredictable fury that is reminiscent of the unpredictability of the sea. To the ancient world, the sea was an unknown quantity, a bringer of nourishment and transport but also a cause of death and destruction, storms rising from flat seas and skies. Poseidon, the god of the oceans, was also the god of the storms, earthquakes and destruction, the god of protection and disappearance at sea. In this way, Odysseus' πορφύρεος cloak is an image of his turbulent, powerful, sea-hewn character.

There is suggestion of a link between πορφύρεος and movement, as the verb πορφύρω can mean 'to swirl' (Sassi, 2017), and if so, the descriptor conveys perfectly the shifting of the tides, and the inconstancy of the sea's character. However, one dissenting commentator is Rutherford (1983, p.126), who argues that πορφύρεος is only derived from the Greek name for the murex dye (πορφύρα). Despite the controversy surrounding this etymological debate, it can be assumed that even if there is no definitive etymological link between the two terms, the ancient audience would have been aware of the similarity between them, and therefore recognised some connection.

The ancient Greeks were fascinated by the sea, as can be seen in their attempts to rationalise and describe its shifting colour, transparency, and movement. Sorabji (2004) comments on Aristotle's observation that the appearance of the sea would change with the perspective of the viewer; that reflection, surroundings, distance, and the angle of observation and resulting reflections could all affect the viewer's experience of the sea. Aristotle suggests that the sea is an unstable body, rather than a fixed one, and this again reinforces the idea of the volatility of the sea in its varying character, as reflected by its constantly changing colour. This can be seen in the range of colours Homer used to describe the sea, as Griffith (2005) notes, such as γλαυκός ('bright', 'white', 'grey'), μέλας ('dark', 'black'), οἴνοψ ('wine-dark'), but never κύανος (which we believe to be 'blue').

When assessing ancient descriptions of the sea, one cannot neglect arguably its most debated epithet: the οἴνοψ (wine-dark) sea. There have been a myriad interpretations of this epithet, almost all of which hold some element of truth, and its range of interpretations reflects perfectly the richness of meaning conveyed in all Homeric language, which is rarely confined to one aspect of the noun described. Platnauer (1921) notes the occurrences of οἴνοψ in Greek literature, as it is not limited

to description of the sea. Sophocles uses it to describe ivy, Euripides uses it to describe a snake and wine-reddened cheeks, Aristotle uses it to describe the colour of grapes. Even Homer does not confine it to the sea, but uses the epithet to describe cattle (Hom. *Il.* 13.703). It must be recognised that later authors were aware of their references to Homeric colour language, but this repeated use of the term suggests that this was a recognised colour term, or at least a well-known descriptor.

There have been many suggestions as to the meaning of the wine-dark sea, such as Sassi (2017), who states that the epithet refers to the shine of wine at symposiums, an instance of the role of 'shininess' in colour. Rutherford (1983, p.125) suggests that this epithet refers to a particular meteorological phenomenon: a sunset at sea with a day of fair weather to come, as the phrase 'red sky at night, shepherd's delight' references. Rutherford outlines the meteorological explanation for this saying: that particles of dust in the air at dusk lead to the red colour and are generally a good indicator of dry weather the next day. He cites many examples of these 'sunset-red' seas, such as at Patroclus' funeral pyre, when Leucothea gives Odysseus a magical robe, and as Telemachus sails to meet Nestor. Rutherford (1983) argues that enough of these events explicitly take place in the evening to warrant the assumption that other events using the epithets reflect sunset or the navigation of ships by the stars.

However, there is one occasion in the *Odyssey* which Rutherford cites as a sunset sea, where 'δύσετό τ' ἡέλιος σκιάωντό τε πᾶσαι ἀγυαί' ('the sun went down and all the streets went dark')⁷(Hom. *Od.* 2.388), and Telemachus is instructed by Athena to sail over the wine-dark sea. Here, by the time Telemachus begins to sail, the sun has already set, a point emphasised by Homer's comment that 'all the streets went dark'. While the sea is depicted at sunset here, the actual use of the epithet is far later, in line 421, long after 'all the streets went dark', and so this is not as definitive an example of the wine-dark sunset sea as Rutherford (1983) seems to suggest. This issue rotates around the axis of tense, and whether the sun was setting as they sailed, or whether this event continued during their journey. This is debateable, as while the sun δύσετό ('went down') is aorist, suggesting a completed action, σκιάωντό ('went dark') is imperfect, and could be taken to be the inceptive imperfect, meaning that the streets were continuing to dim as they sailed. This raises the idea that the wine-dark sea may not exclusively refer to sunset seas, but also seas after the sunset, particularly in the twilight hours after dusk when the remnants of daylight cling to the sky. This supports Rutherford's (1983) additional theory that the wine-dark sea is sometimes tied to late-night navigation and voyages, though Rutherford does not specifically suggest any allusion to the luminosity of twilight in his argument. In this way, Rutherford's (1983) argument that the wine-dark sea is a sunset image, although insightful, is not fully applicable to every example of the epithet.

It is important to also consider the metaphorical implications that this sunset sea may have, which Rutherford (1983) does not address. Through analysis of the iterations of this epithet, the sunset sea can often be seen at times of tragic contemplation, which supports the idea of the sunset sea before a calm day as

perhaps the epithet is intended to convey the moment of quiet contemplation that a clear night brings. One example of this can be found in the *Iliad* (Hom. *Il.* 23.143), where Achilles looks out over the wine-dark sea as the pyre of Patroclus burns, an event which takes place either just before sunset or as it begins. This moment is one of quiet and thoughtfulness as he cuts off a lock of hair to place on Patroclus in the flames, before he speaks to Spercheus, the river to whom Peleus, his father, had promised that Achilles would not cut a lock from his hair and would sacrifice to when he returned home. Since he knows he will not return home, he cuts his hair for Patroclus, a symbolic and weighty decision. It could also be suggested that the reflection of the burning pyre in the ocean conveys the effect of the setting sun, linking the 'winey' sea to the death of Patroclus, the subject of Achilles' contemplation.

Another example can be found in the *Odyssey*, where Odysseus is given a magic garment by Leucothea, and told to throw it into the 'wine-dark sea' (Hom. *Od.* 5.349). Rutherford (1983, p.127) argues that since Odysseus falls asleep the moment he can when he reaches the shore and is then awoken by girls coming to wash (an expected morning activity), it can be assumed that his is a sunset arrival, and 'it would thus be a sunset arrival he refers to when he tells Nausicaa of escaping the οἴνοπα πόντον' (Hom. *Od.* 6.170). This argument seems sound, however his assumption that Odysseus returns the veil at sunset is less certain, as although Odysseus stumbles to a place of refuge to rest after his dangerous and exhausting journey, 'he was exhausted by his struggle with the sea' (Hom. *Od.* 5.454), and so it cannot be assumed that he fell asleep at sunset. However, the most striking aspect of this section is its link to the supernatural, a theme that occurs multiple time in Homer, which warrants exploration as a possible metaphorical connotation of the epithet. This can also be seen as Hera flies across the sky in the *Iliad* (5.770-72), as Rutherford (1983) notes, her horses galloping as far as a man staring across the wine-dark deep can see. Not only does this image elevate the metaphor describing the power of her horses, and tie the image of Hera riding across the sky to images of the majesty of sunset, it also ties together the idea of the mystical and the wine-dark sea again. This connection is one that links the uncertainty and wonder of dusk, as day shifts to night in a display of overwhelming splendour, to the unknowable majesty and wonder of the gods and the supernatural.

To return to the core ancient measures of colour, transparency also lay at the heart of understanding and description of colour, both in a scientific and literary context. Aristotle considered transparency the 'seat of colour' (Sorabji, 2004, p.130), a theory explained by Sorabji (2004, p.129-30) where he highlights Aristotle's differentiation between the idea of 'own colour', which acts on the transparency of the medium and light in between the object and viewer, and 'borrowed colour', which is used to understand the changeable colour of the sea. Where an object is predominantly transparent, as the sea is, it is obvious that the seat of its colour is transparency, but even in opacity, a lesser transparency is the seat.

The final notable measure of colour was ‘brightness’, which can be defined as where a colour lay on a black-white spectrum. Sorabji (1972, 293-4) comments on Aristotle’s theory that colour is created through a mixture of black bodies with white, and assumes that these ‘bodies’ refer to the four elements, water, fire, earth and wind. Plato developed this theory in the suggestion that rays from the eyes collided with the objects in our field of vision, and that these rays could be extended by λευκός (‘white’) and shortened by μέλας (‘black’) (Plat. *Tim.* 67e). This idea of ‘brightness’ in colour can be seen in the various translations of μέλας and λευκός, which can, of course, be interpreted as ‘black’ and ‘white’, but also ‘dark’ and ‘light’ or ‘bright’.

This idea of the importance of brightness also encapsulates the role of ‘shininess’, as Platnauer (1921, p.156) defines it, a role which can most be seen clearly in the term γλαυκός, which is usually translated as ‘grey’. However, this term can be translated as ‘flashing’ or ‘glinting’ in many situations, such as in the epithet γλαυκῶπις, which is frequently used to refer to the eyes of Athena. ‘τὸν δ’ ἠμείβετ’ ἔπειτα θεά, γλαυκῶπις Ἀθήνη’, meaning ‘then the goddess, flashing-eyed Athena answered him’ (Hom. *Od.* 1:44) is an example of such an epithet. Here, γλαυκῶπις is translated as ‘flashing-eyed’, conveying not only the colour of Athena’s eyes but their flashing brightness, a description that connotes her intelligence and quick mind. Wilson, a recent translator of the *Odyssey*, notes in a lecture (2019) that she did not always translate Athena’s this epithet consistently throughout the text, varying the epithet using terms such as ‘glinted’ and ‘sparkled’.

Sassi (2017) draws attention to Aristotle’s *Meteorology* (Arist. *Mete.* 3.375a), where in Book 3 he notes that manufacturers notice change in colour based on the light under which they work, which shows the importance also of brightness of the surroundings in the perception of colour.

The combination of these four measures coupled with the hues that we recognise create a flexible use of colour terminology that can appear alien to the modern reader, where each colour word may not directly refer to a single hue, brightness or transparency, but to a range of subtle combinations and contexts. These meanings should also not be limited to colour, as can be illustrated by the various meanings of the word χλωρός, which can be translated, as recorded by Platnauer (1921) as moss green, honey-yellow, a shade of pale skin, or even fresh, and (Gladstone, 1858) metaphorically representing fear. This is testament to the flexibility of ancient colour terminology, which was not confined to one meaning, but also to other aspects of nature.

Another example of this flexibility lies in skin colour descriptions, as noted by Whitmarsh (2018) where μελαγχροῖς, translated usually as ‘tanned’ or ‘black-skinned’, conveys an image of masculinity. Whitmarsh’s example is of Odysseus when Athena magically restores his appearance, making him μελαγχροῖς once more (Hom. *Od.* 16.175), and he suggests that this refers to Odysseus’ ‘rugged, outdoors life’ in Ithaca. In the same essay Whitmarsh (2018) also suggests a connection between Odysseus’ black skin and his characteristic of cunning, as his companion Eurybates

is said to have the same μελανόχρους skin, and to be favoured by Odysseus 'ὅτι οἱ φρεσὶν ἄρτια ἦδη' ('because his mind matched his' Hom. *Od.* 248). This idea of character, particularly cunning, reflected in colour terminology is supported by the aforementioned γλαυκός, used to convey the intelligence of Athena.

The reverse can be seen in the effeminacy implied by white skin (Whitmarsh, 2018), who notes it as a term of honour in reference to women and of derision to men. This can be seen in the *Homeric Hymn to Dionysus* (*HH* 1.7), where Hera is described as λευκώλενον (white-armed) (*HH* 1.7), a term of respect to describe the femininity of the queen of the gods. In contrast, in Xenophon's *Hellenica*, when the troops come across a λευκούς (white-skinned) people, they assume that the race will be weak and as easy to defeat as women (Xen. *Hell.* 3.4.19) (Whitmarsh, 2018 cites this as an example of the alienness of white-skinned people to Xenophon). Furthermore, these people are white due to the fact that they are constantly clothed, and also seen as μαλακούς (soft) and ἀπόνους (unused to toil) as they ride in carriages, which supports Whitmarsh's (2018) comment that being 'black-skinned' was linked to a hard-working, 'outdoors' life, and whiteness a mark of effeminacy.

While this concept of flexibility of terminology may seem alien at first glance, it is less foreign to modern understanding of colour than one might think. Today, colour often carries the same complex codes, such as the connection between blue and melancholy. In fact, purple still connotes power and wealth much in the same way that it did in the Homeric world. It would not be presumptuous, therefore, to imagine civilizations in the millennia after ours wondering at the confused use of blue in our description of music and emotion, hypothesising a societal synaesthesia.

In this way, the Ancient Greeks were not deficient in their experience of colour, as Gladstone (1858) suggests, or, for that matter, that their language was deficient, as Platnauer (1921) suggests. Instead, we must rework the criteria by which we analyse ancient colour terminology and expand our understanding of the aims of colour language. Only then can we fully comprehend the subtlety of Homeric metaphor, and picture the vivid world in which the ancients lived.

- 1- Both here and on other occasions where I have cited texts on ancient literature without the ancient reference, see the cited text for ancient references.
- 2- These measures have been gathered from ideas discussed in the majority of my reference list, with specific emphasis on the terminology of Sassi (saliency, movement), Platnauer (brightness and shininess) and Sorabji (who discusses Aristotle's ideas on transparency)
- 3- Here Sassi is referring to Plato's *Timaeus* 67e-68b

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