

ΠΕΡΙ ΕΡΜΗΝΕΙΑΣ

10 a I. Πρῶτον δεῖ θέσθαι τί ὄνομα καὶ τί ῥῆμα, ἔπειτα τί ἐστὶν ἀπόφαισις καὶ κατάφαισις καὶ ἀπόφαισις καὶ λόγος.

5 Ἔστι μὲν οὖν τὰ ἐν τῇ φωνῇ τῶν ἐν τῇ ψυχῇ παθημάτων σύμβολα, καὶ τὰ γραφόμενα τῶν ἐν τῇ φωνῇ. καὶ ὥσπερ οὐδὲ γράμματα πᾶσι τὰ αὐτά, οὐδὲ φωναὶ αἱ αὐταί· ὧν μέντοι ταῦτα σημεῖα πρώτως, ταῦτα πᾶσι παθήματα τῆς ψυχῆς, καὶ ὧν ταῦτα ὁμοιώματα, πράγματα ἤδη ταῦτά. περὶ μὲν οὖν τούτων εἴρηται ἐν τοῖς περὶ ψυχῆς· ἄλλης γὰρ πραγματείας.

10 Ἔστι δ', ὥσπερ ἐν τῇ ψυχῇ ὅτε μὲν νόημα ἄνευ τοῦ ἀληθεύειν ἢ ψεύδεσθαι, ὅτε δὲ ἤδη ὦ ἀνάγκη τούτων ὑπάρχειν θάτερον, οὕτω καὶ ἐν τῇ φωνῇ· περὶ γὰρ σύνθεσιν καὶ διαίρεσιν ἐστὶ τὸ ψεῦδος

* It is hard to say which is the passage, provided this means the *De Anima*. Dr. W. D. Ross has observed that 'The *De Interpretatione* was suspected by Andronicus, on the ground, apparently, of a reference to the *De Anima* to which nothing in that work corresponds. There are, however, many such references in undoubtedly genuine works of Aristotle, and more than one way of explaining them. There is strong external evidence for its authenticity: Theophrastus and Eudemus both wrote books which seem to presuppose it, and Ammonius tells us that Andronicus

ON INTERPRETATION

I. Let us, first of all, define noun and verb, then explain what is meant by denial, affirmation, proposition and sentence.

Words spoken are symbols or signs of affections or impressions of the soul; written words are the signs of words spoken. As writing, so also is speech not the same for all races of men. But the mental affections themselves, of which these words are primarily signs, are the same for the whole of mankind, as are also the objects of which those affections are representations or likenesses, images, copies. With these points, however, I dealt in my treatise concerning the soul^a; they belong to a different inquiry from that which we now have in hand.

As at times there are thoughts in our minds unaccompanied by truth or by falsity, while there are others at times that have necessarily one or the other, so also it is in our speech, for combination and division are essential before you can have truth and

was the only critic who cast doubt on it. Finally, its style and grammar seem to be genuinely Aristotelian. All that can really be said against it is that much of it is somewhat elementary; but Aristotle doubtless gave elementary as well as advanced lectures' (*Aristotle*, p. 10). The Provost of Oriel remarks that H. Maier 'suggests that the reference in 16 a 8 should be transferred to 16 a 13 and relates to *De An.* iii. 6.'

16^a καὶ τὸ ἀληθές. τὰ μὲν οὖν ὀνόματα αὐτὰ καὶ τὰ
 ῥήματα ἔοικε τῷ ἄνευ συνθέσεως καὶ διαιρέσεως
 15 νοήματι, οἷον τὸ ἄνθρωπος ἢ τὸ λευκόν, ὅταν μὴ
 προστεθῇ τι· οὔτε γὰρ ψεῦδος οὔτε ἀληθές πω.
 σημεῖον δ' ἐστὶ τοῦδε· καὶ γὰρ ὁ τραγέλαφος
 σημαίνει μὲν τι, οὐπω δὲ ἀληθές ἢ ψεῦδος, εἰάν
 μὴ τὸ εἶναι ἢ μὴ εἶναι προστεθῇ, ἢ ἀπλῶς ἢ κατὰ
 χρόνον.

20 II. Ὅνομα μὲν οὖν ἐστὶ φωνὴ σημαντικὴ κατὰ
 συνθήκην ἄνευ χρόνου, ἥς μηδὲν μέρος ἐστὶ ση-
 मानτικὸν κεχωρισμένον· ἐν γὰρ τῷ Κάλλιππος τὸ
 ἵππος οὐδὲν αὐτὸ καθ' ἑαυτὸ σημαίνει, ὥσπερ ἐν
 τῷ λόγῳ τῷ καλὸς ἵππος. οὐ μὲν οὐδ' ὥσπερ
 ἐν τοῖς ἀπλοῖς ὀνόμασιν, οὕτως ἔχει καὶ ἐν τοῖς
 25 συμπεπλεγμένοις· ἐν ἐκείνοις μὲν γὰρ τὸ μέρος
 οὐδαμῶς σημαντικόν, ἐν δὲ τούτοις βούλεται μὲν,
 ἀλλ' οὐδενὸς κεχωρισμένον, οἷον ἐν τῷ ἐπακτρο-
 κέλης τὸ κέλης οὐδὲν σημαίνει καθ' ἑαυτό.

Τὸ δὲ κατὰ συνθήκην, ὅτι φύσει τῶν ὀνομάτων
 οὐδὲν ἐστίν, ἀλλ' ὅταν γένηται σύμβολον, ἐπεὶ
 δηλοῦσί γέ τι καὶ οἱ ἀγράμματοι ψόφοι, οἷον
 θηρίων, ὧν οὐδὲν ἐστὶν ὄνομα.

30 Τὸ δ' οὐκ ἄνθρωπος οὐκ ὄνομα. οὐ μὲν οὐδὲ
 κεῖται ὄνομα ὃ τι δεῖ καλεῖν αὐτό· οὔτε γὰρ λόγος
 οὔτε ἀπόφασίς ἐστίν. ἀλλ' ἔστω ὄνομα ἀόριστον,
 ὅτι ὁμοίως ἐφ' ὅτου οὖν ὑπάρχει καὶ ὄντος καὶ μὴ
 ὄντος.

* ἢ ἀπλῶς ἢ κατὰ χρόνον; some would render these words 'in the present or some other tense.' I retain the Greek word rendered 'goat-stag,' which stands for a fabulous animal, half of it goat and half stag, since the word can nowadays be found in a number of good English dictionaries.

falsity. A noun or a verb by itself much resembles a concept or thought which is neither combined nor disjoined. Such is 'man,' for example, or 'white,' if pronounced without any addition. As yet it is not true nor false. And a proof of this lies in the fact that 'tragelaphos,' while it means something, has no truth nor falsity in it, unless in addition you predicate being or not-being of it, whether generally (that is to say, without definite time-connotation) or in a particular tense.^a

II. A noun is a sound having meaning established by convention alone but no reference whatever to time, while no part of it has any meaning, considered apart from the whole. Take the proper name 'Good-steed,' for instance. The 'steed' has no meaning apart, as it has in the phrase 'a good steed.' It is necessary to notice, however, that simple nouns differ from composite. While in the case of the former the parts have no meaning at all, in the latter they have a certain meaning but not as apart from the whole. Let us take 'pirate-vessel,' for instance. The 'vessel' has no sense whatever, except as a part of the whole.

We have already said that a noun signifies this or that *by convention*. No sound is by nature a noun: it becomes one, becoming a symbol. Inarticulate noises mean something—for instance, those made by brute beasts. But no noises of that kind are nouns.

'Not-man' and the like are not nouns, and I know of no recognized names we can give such expressions as these, which are neither denials nor sentences. Call them (for want of a better) by the name of indefinite nouns, since we use them of all kinds of things, non-existent as well as existing.

16 b Τὸ δὲ Φίλωνος ἢ Φίλωνι καὶ ὅσα τοιαῦτα, οὐκ
 ὀνόματα ἀλλὰ πτώσεις ὀνόματος. λόγος δέ ἐστιν
 αὐτοῦ τὰ μὲν ἄλλα κατὰ τὰ αὐτά· ὅτι δὲ μετὰ τοῦ
 ἐστίν ἢ ἦν ἢ ἔσται οὐκ ἀληθεύει ἢ ψεύδεται, τὸ
 δὲ ὄνομα ἀεὶ· οἷον Φίλωνός ἐστιν ἢ οὐκ ἐστίν·
 οὐδὲν γάρ πω οὔτε ἀληθεύει οὔτε ψεύδεται.

III. Ῥῆμα δέ ἐστι τὸ προσσημαῖνον χρόνον, οὐ
 μέρος οὐδὲν σημαίνει χωρίς, καὶ ἐστίν ἀεὶ τῶν
 καθ' ἑτέρου λεγομένων σημείον. λέγω δ' ὅτι
 προσσημαίνει χρόνον, οἷον ὑγίεια μὲν ὄνομα, τὸ
 δὲ ὑγιαίνει ῥῆμα· προσσημαίνει γὰρ τὸ νῦν ὑπ-
 10 ἄρχειν. καὶ ἀεὶ τῶν καθ' ἑτέρου λεγομένων
 σημείον ἐστίν, οἷον τῶν καθ' ὑποκειμένου ἢ ἐν
 ὑποκειμένῳ.

Τὸ δὲ οὐχ ὑγιαίνει καὶ τὸ οὐ κάμνει οὐ ῥῆμα
 λέγω· προσσημαίνει μὲν γὰρ χρόνον καὶ ἀεὶ κατὰ
 τινος ὑπάρχει, τῇ δὲ διαφορᾷ ὄνομα οὐ κεῖται· ἀλλ'
 15 ἔστω ἀόριστον ῥῆμα, ὅτι ὁμοίως ἐφ' ὅτου οὖν ὑπ-
 ἄρχει, καὶ ὄντος καὶ μὴ ὄντος.

Ὅμοίως δὲ καὶ τὸ ὑγίανεν ἢ τὸ ὑγιανεῖ οὐ ῥῆμα,
 ἀλλὰ πτώσις ῥήματος· διαφέρει δὲ τοῦ ῥήματος,
 ὅτι τὸ μὲν τὸν παρόντα προσσημαίνει χρόνον, τὰ
 δὲ τὸ πέριξ.

20 Αὐτὰ μὲν οὖν καθ' ἑαυτὰ λεγόμενα τὰ ῥήματα
 ὀνόματά ἐστι καὶ σημαίνει τι (ἴσθησι γὰρ ὁ λέγων

ON INTERPRETATION, II-III

'Of Philo,' 'to Philo,' and so on are cases of nouns and not nouns. Otherwise we define all these cases as the noun in itself is defined; but when 'is,' 'was' or 'will be' is added, they do not then form propositions, which either are true or are false, as the noun itself always does then. For 'of Philo is' cannot by itself constitute a true or false proposition. Nor yet can 'of Philo is not.'

III. A verb is a sound which not only conveys a particular meaning but has a time-reference also. No part by itself has a meaning. It indicates always that something is said or asserted *of* something. Let me explain what I mean by 'it has a time-reference also.' Now, 'health' is a noun, for example, 'is healthy' is a verb, not a noun. For the latter conveys its own meaning but also conveys that the state signified (namely, health) now exists. Then, a verb was an indication of something asserted *of* something; I mean, of a something predicated of a subject or found present in it.

'Is not-ill,' 'is not-well' and so on I should not, for my own part, call verbs. Though they certainly have the time-reference and function at all times as predicates, I know of no recognized name. Let us call them (for want of a better) by the name of indefinite verbs, since we use them of all kinds of things, non-existent as well as existent.

'He was healthy' or 'he will be healthy' I likewise should not call a verb. I should call it the tense of a verb. Verb and tenses in this respect differ: the verb indicates present time but the tenses all times save the present.

Verbs by themselves, then, are nouns, and they stand for or signify something, for the speaker stops

16 b

τὴν διάνοιαν, καὶ ὁ ἀκούσας ἡρέμησεν), ἀλλ' εἴ
 ἔστιν ἢ μὴ, οὐπω σημαίνει· οὐδὲ γὰρ τὸ εἶναι ἢ
 μὴ εἶναι σημείον ἐστὶ τοῦ πράγματος, οὐδ' ἐάν
 25 οὐδέν ἐστι, προσσημαίνει δὲ σύνθεσιν τινα, ἣν
 ἄνευ τῶν συγκειμένων οὐκ ἔστι νοῆσαι.

IV. Λόγος δέ ἐστι φωνὴ σημαντικὴ¹ ἥς τῶν
 μερῶν τι σημαντικόν ἐστι κεχωρισμένον, ὡς φάσις,
 ἀλλ' οὐχ ὡς κατάφασις ἢ ἀπόφασις. λέγω δέ,
 οἷον ἄνθρωπος σημαίνει μὲν τι, ἀλλ' οὐχ ὅτι
 ἔστιν ἢ οὐκ ἔστιν· ἀλλ' ἔσται κατάφασις ἢ ἀπό-
 30 φασις, ἐάν τι προστεθῇ. ἀλλ' οὐχὶ τοῦ ἀνθρώπου
 συλλαβὴ μία. οὐδὲ γὰρ ἐν τῷ μὺς τὸ ὕς σημαν-
 τικόν, ἀλλὰ φωνὴ ἐστὶ νῦν μόνον. ἐν δὲ τοῖς
 διπλοῖς σημαίνει μὲν, ἀλλ' οὐ καθ' αὐτό, ὡς
 προεῖρηται.

17 a

Ἔστι δὲ λόγος ἅπας μὲν σημαντικός, οὐχ ὡς
 ὄργανον δέ, ἀλλ' ὡς προεῖρηται, κατὰ συνθήκην.
 ἀποφαντικός δὲ οὐ πᾶς, ἀλλ' ἐν ᾧ τὸ ἀληθεύειν ἢ
 ψεύδεσθαι ὑπάρχει. οὐκ ἐν ἅπασιν δὲ ὑπάρχει,
 5 οἷον ἢ εὐχή λόγος μὲν, ἀλλ' οὔτε ἀληθὴς οὔτε
 ψευδής. οἱ μὲν οὖν ἄλλοι ἀφείσθωσαν· ῥητορικῆς
 γὰρ ἢ ποιητικῆς οἰκειοτέρα ἢ σκέψις· ὁ δὲ ἀπο-
 φαντικός τῆς νῦν θεωρίας.

V. Ἔστι δὲ εἰς πρῶτος λόγος ἀποφαντικός κατὰ-
 10 φασις, εἶτα ἀπόφασις· οἱ δ' ἄλλοι πάντες συνδέσμων
 εἰς.

¹ B. adds κατὰ συνθήκην.

^a Here the existential sense of the verb 'to be' is ignored and the copulative only considered.

^b Aristotle, of course, has in mind also questions, commands and the like.

ON INTERPRETATION, III-V

his process of thinking and the mind of the hearer acquiesces. However, they do not as yet express positive or negative judgements. For even the infinitives 'to be,' 'not to be,' and the participle 'being' are indicative only of fact, if and when something further is added. They indicate nothing themselves but imply a copulation or synthesis, which we can hardly conceive of apart from the things thus combined.^a

IV. A sentence is significant speech, of which this or that part may have meaning—as something, that is, that is uttered but not as expressing a judgement of a positive or negative character. Let me explain this more fully. Take 'mortal.' This, doubtless, has meaning but neither affirms nor denies ; some addition or other is needed before it can affirm or deny. But the syllables of 'mortal' are meaningless. So it is also with 'mouse,' of which ' -ouse ' has no meaning whatever and is but a meaningless sound. But we saw that in composite nouns the particular parts have a meaning, although not apart from the whole.

But while every sentence has meaning, though not as an instrument of nature but, as we observed, by convention, not all can be called propositions. We call propositions those only that have truth or falsity in them. A prayer is, for instance, a sentence but neither has truth nor has falsity. Let us pass over all such, as their study more properly belongs to the province of rhetoric or poetry.^b We have in our present inquiry propositions alone for our theme.

V. A simple affirmation is the first kind, a simple negation the second of those propositions called simple. The rest are but one by conjunction.

17 a

Ἀνάγκη δὲ πάντα λόγον ἀποφαντικὸν ἐκ ῥήματος εἶναι ἢ πτώσεως ῥήματος· καὶ γὰρ ὁ τοῦ ἀνθρώπου λόγος, ἐὰν μὴ τὸ ἔστιν ἢ ἦν ἢ ἔσται ἢ τι τοιοῦτον προστεθῇ, οὕτω λόγος ἀποφαιτικός. διότι δὴ ἔν τί ἐστιν ἀλλ' οὐ πολλὰ τὸ ζῶον πεζὸν δῖπουν· οὐ γὰρ δὴ τῷ σύνεγγυς εἰρησθαι εἰς ἔσται. ἔστι

15 δὲ ἄλλης πραγματείας τοῦτο εἰπεῖν.

Ἔστι δὲ εἰς λόγος ἀποφαιτικός ἢ ὁ ἐν δηλῶν ἢ ὁ συνδέσμῳ εἰς, πολλοὶ δὲ οἱ πολλὰ καὶ μὴ ἐν ἢ οἱ ἀσύνδετοι.

Τὸ μὲν οὖν ὄνομα ἢ ῥήμα φάσις ἔστω μόνον, ἐπειδὴ οὐκ ἔστιν εἰπεῖν οὕτω δηλοῦντά τι τῇ φωνῇ ὥστε ἀποφαίνεσθαι, ἢ ἐρωτῶντός τινος, ἢ μὴ,

20 ἀλλ' αὐτὸν προαιρούμενον.

Τούτων δὲ ἡ μὲν ἀπλὴ ἐστὶν ἀπόφανσις, οἷον τι κατὰ τινος ἢ τι ἀπὸ τινος, ἡ δὲ ἐκ τούτων συγκειμένη οἷον λόγος τις ἤδη σύνθετος. ἔστι δὲ ἡ ἀπλὴ ἀπόφανσις φωνὴ σημαιτική περὶ τοῦ ὑπάρχειν τι ἢ μὴ ὑπάρχειν, ὡς οἱ χρόνοι διήρηνται.

25 VI. Κατάφασις δὲ ἐστὶν ἀπόφανσις τινος κατὰ τινος. ἀπόφασις δὲ ἐστὶν ἀπόφανσις τινος ἀπὸ τινος.

Ἐπεὶ δὲ ἔστι καὶ τὸ ὑπάρχον ἀποφαίνεσθαι ὡς μὴ ὑπάρχον καὶ τὸ μὴ ὑπάρχον ὡς ὑπάρχον καὶ τὸ ὑπάρχον ὡς ὑπάρχον καὶ τὸ μὴ ὑπάρχον ὡς

* Complex or composite propositions are those that comprise more than one, as, for instance, 'A is B, C and D,' 'A is B, and C is D,' and so forth.

ON INTERPRETATION, v-vi

Of all propositions a verb or a tense of a verb must form part. The definition, for instance, of 'man,' unless 'is,' 'was' or 'will be' is added or something or other of that kind, does not constitute a proposition. But someone may ask how the phrase, 'footed animal, having two feet,' can be held to be one and not many. That the words are pronounced in succession does not constitute them a unity. However, that question belongs to a different inquiry from the present.

Now, those propositions are single which indicate one single fact or are one, as we said, by conjunction. And those propositions are many which indicate not one but many or else have their parts unconjoined.

Nouns and verbs let us call mere expressions. For we cannot use mere nouns or verbs, when expressing or enunciating something, for the purpose of making a statement, and that is so whether we happen to express a spontaneous opinion or someone propounded a question to which we are giving an answer.

And so, to return, we repeat that one kind of propositions is simple, comprising all those that affirm or deny some one thing of another, while the other is composite, that is, compounded of simple propositions.^a And a simple proposition, more fully, is a statement possessing a meaning, affirming or denying the presence of some other thing in a subject in time past or present or future.

VI. We mean by affirmation a statement affirming one thing of another ; we mean by negation a statement denying one thing of another.

As men can affirm and deny both the presence of that which is present and the presence of that which is absent and this they can do with a reference to

^{17 a}
³⁰ μὴ ὑπάρχον, καὶ περὶ τοὺς ἐκτὸς δὲ τοῦ νῦν
 χρόνους ὡσαύτως, ἅπαν ἂν ἐνδέχοιτο καὶ ὁ κατ-
 ἐφήσέ τις ἀποφῆσαι καὶ ὁ ἀπέφησέ τις κατα-
 φῆσαι. ὥστε δῆλον ὅτι πάσῃ καταφάσει ἐστὶν
 ἀπόφασις ἀντικειμένη καὶ πάσῃ ἀποφάσει κατά-
 φασις. καὶ ἔστω ἀντίφασις τοῦτο, κατάφασις
 καὶ ἀπόφασις αἱ ἀντικείμεναι. λέγω δὲ ἀντι-
³⁵ κείσθαι τὴν τοῦ αὐτοῦ κατὰ τοῦ αὐτοῦ, μὴ ὁμω-
 νύμως δέ, καὶ ὅσα ἄλλα τῶν τοιούτων προσδι-
 οριζόμεθα πρὸς τὰς σοφιστικὰς ἐνοχλήσεις.

VII. Ἐπεὶ δ' ἐστὶ τὰ μὲν καθόλου τῶν πραγ-
⁴⁰ μάτων τὰ δὲ καθ' ἕκαστον (λέγω δὲ καθόλου μὲν
 ὁ ἐπὶ πλειόνων πέφυκε κατηγορεῖσθαι, καθ'
^{17 b} ἕκαστον δὲ ὁ μὴ, οἷον ἄνθρωπος μὲν τῶν καθόλου,
 Καλλίας δὲ τῶν καθ' ἕκαστον). ἀνάγκη δὲ ἀπο-
 φαίνεσθαι ὡς ὑπάρχει τι ἢ μὴ ὅτε μὲν τῶν καθόλου
 τινί, ὅτε δὲ τῶν καθ' ἕκαστον. εἰ μὲν οὖν
 καθόλου ἀποφαίνεται ἐπὶ τοῦ καθόλου ὅτι ὑπάρχει
⁵ τι ἢ μὴ, ἔσονται ἐναντίαι αἱ ἀποφάνσεις. λέγω
 δὲ ἐπὶ τοῦ καθόλου ἀποφαίνεσθαι καθόλου, οἷον
 πᾶς ἄνθρωπος λευκός, οὐδεὶς ἄνθρωπος λευκός.
 ὅταν δὲ ἐπὶ τῶν καθόλου μὲν, μὴ καθόλου δέ,
 αὗται μὲν οὐκ εἰσὶν ἐναντίαι, τὰ μέντοι δηλούμενα
 ἔστιν εἶναι ἐναντία ποτέ. λέγω δὲ τὸ μὴ καθόλου
¹⁰ ἀποφαίνεσθαι ἐπὶ τῶν καθόλου, οἷον ἔστι λευκός
 ἄνθρωπος, οὐκ ἔστι λευκός ἄνθρωπος· καθόλου
 γὰρ ὄντος τοῦ ἄνθρωπος οὐχ ὡς καθόλου κέχρηται

ON INTERPRETATION, VI-VII

times that lie outside the present, whatever a man may affirm, it is possible as well to deny, and whatever a man may deny, it is possible as well to affirm. Thus, it follows, each affirmative statement will have its own opposite negative, just as each negative statement will have its affirmative opposite. Every such pair of propositions we, therefore, shall call contradictories, always assuming the predicates and subjects are really the same and the terms used without ambiguity. These and some other provisos are needed in view of the puzzles propounded by importunate sophists.

VII. Of things there are some universal and some individual or singular, according, I mean, as their nature is such that they can or they cannot be predicates of numerous subjects, as 'man,' for example, and 'Callias.'

Propositions, affirmative and negative, must sometimes have universal subjects, at others individual or singular. Suppose we state two propositions, one affirmative, one of them negative, both universal in form, having one universal for subject; then these propositions are contrary. By 'both universal in form, having one universal for subject,' I mean to say such propositions as 'every man is white,' on the one hand, and 'no man is white,' on the other. When, however, the two propositions, while having a universal subject, are not universal in character, we cannot describe them as contraries, though on occasions, it may be, the meaning intended is contrary. Take as examples of these 'man is white,' 'man is not white' and so on. The subject or 'man' is universal, and yet the propositions themselves are not stated as though universal. For neither contains the word

17 b τῇ ἀποφάνσει· τὸ γὰρ πᾶς οὐ τὸ καθόλου σημαίνει
 ἀλλ' ὅτι καθόλου. ἐπὶ δὲ τοῦ κατηγορουμένου
 καθόλου κατηγορεῖν τὸ καθόλου οὐκ ἔστιν ἀληθές·
 οὐδεμία γὰρ κατάφασις ἀληθὴς ἔσται, ἐν ᾗ τοῦ
 15 κατηγορουμένου καθόλου τὸ καθόλου κατηγορεῖται,
 οἷον ἔστι πᾶς ἄνθρωπος πᾶν ζῶον.

Ἀντικεῖσθαι μὲν οὖν κατάφασιν ἀποφάσει λέγω
 ἀντιφατικῶς τὴν τὸ καθόλου σημαίνουσαν τῷ
 αὐτῷ ὅτι οὐ καθόλου, οἷον πᾶς ἄνθρωπος λευκός
 —οὐ πᾶς ἄνθρωπος λευκός, οὐδεὶς ἄνθρωπος λευκός
 20 —ἔστι τις ἄνθρωπος λευκός· ἐναντίως δὲ τὴν τοῦ
 καθόλου κατάφασιν καὶ τὴν τοῦ καθόλου ἀπόφασιν,
 οἷον πᾶς ἄνθρωπος λευκός—οὐδεὶς ἄνθρωπος λευ-
 κός, πᾶς ἄνθρωπος δίκαιος—οὐδεὶς ἄνθρωπος
 δίκαιος.

Διὸ ταύτας μὲν οὐχ οἷόν τε ἅμα ἀληθεῖς εἶναι,
 τὰς δὲ ἀντικειμένας αὐταῖς ἐνδέχεται ποτε ἐπὶ
 25 τοῦ αὐτοῦ ἅμα ἀληθεῖς εἶναι, οἷον οὐ πᾶς ἄνθρωπος
 λευκός καὶ ἔστι τις ἄνθρωπος λευκός. ὅσαι μὲν
 οὖν ἀντιφάσεις τῶν καθόλου εἰσὶ καθόλου, ἀνάγκη
 τὴν ἑτέραν ἀληθῆ εἶναι ἢ ψευδῇ, καὶ ὅσαι ἐπὶ τῶν

* 'Distributed,' in the language of the text books.

'every.' The subject is not a universal in virtue of having an 'every'; but 'every,' applied to the subject, confers on the whole proposition its absolute universality. And yet, if *both* subject and predicate are used in their fullest extension,^a the resulting proposition will be false. For, indeed, no affirmation at all could, in those circumstances, be true. 'Every man is every animal' will serve as a good illustration of this.

When their subject is one and the same but of two propositions the affirmative clearly indicates in its terms that the subject is taken universally, the negative, however, that the subject is not universally taken, I call them contradictorily opposed. Examples are 'every man is white,' 'not every man is white' and the like, or, again, we have 'some men are white,' to which 'no man is white' is opposed in the manner of which I am speaking. Propositions are contrarily opposed when affirmative and negative alike are possessed of a universal character—the subject, that is, in both cases being marked as universally taken. Thus 'every man is white' or 'is just' is the contrary, not the contradictory, of 'no man is white' or 'is just.'

In the case of such contraries we see that not both can be true at one time. Notwithstanding, their contradictories sometimes are both of them true, though their subject be one and the same. On the one hand, 'not every man is white,' on the other hand, 'some men are white' will be both of them true propositions. But of those contradictory opposites having universals for subjects and being universal in character, one must be true, the other false. This also holds good of propositions with singular terms

17^b καθ' ἕκαστα, οἷον ἔστι Σωκράτης λευκός—οὐκ
 ἔστι Σωκράτης λευκός· ὅσαι δὲ ἐπὶ τῶν καθόλου
 80 μέν, μὴ καθόλου δέ, οὐκ αἰεὶ ἢ μὲν ἀληθῆς ἢ δὲ
 ψευδής. ἅμα γὰρ ἀληθές ἐστιν εἰπεῖν ὅτι ἔστιν
 ἄνθρωπος λευκός καὶ ὅτι οὐκ ἔστιν ἄνθρωπος
 λευκός, καὶ ἔστιν ἄνθρωπος καλός καὶ οὐκ ἔστιν
 ἄνθρωπος καλός. εἰ γὰρ αἰσχροός, καὶ οὐ καλός·
 καὶ εἰ γίνεται τι, καὶ οὐκ ἔστιν. δόξειε δ' ἂν
 85 ἐξαίφνης ἄτοπον εἶναι διὰ τὸ φαίνεσθαι σημαίνειν
 τὸ οὐκ ἔστιν ἄνθρωπος λευκός ἅμα καὶ ὅτι οὐδεὶς
 ἄνθρωπος λευκός· τὸ δὲ οὐτε ταυτόν σημαίνει οὐθ'
 ἅμα ἐξ ἀνάγκης.

Φανερόν δὲ ὅτι καὶ μία ἀπόφασις μιᾶς κατα-
 φάσεώς ἐστι· τὸ γὰρ αὐτὸ δεῖ ἀποφῆσαι τὴν ἀπό-
 φασιν ὅπερ κατέφησεν ἢ κατάφασις, καὶ ἀπὸ τοῦ
 18^a αὐτοῦ, ἢ τῶν καθ' ἕκαστά τινος ἢ ἀπὸ τῶν
 καθόλου τινός, ἢ ὡς καθόλου ἢ ὡς μὴ καθόλου.
 λέγω δὲ οἷον ἔστι Σωκράτης λευκός—οὐκ ἔστι
 Σωκράτης λευκός. ἐὰν δὲ ἄλλο τι ἢ ἀπ' ἄλλου
 τὸ αὐτό, οὐχ ἢ ἀντικειμένη ἀλλ' ἔσται ἐκείνης
 ἑτέρα. τῇ δὲ πᾶς ἄνθρωπος λευκός ἢ οὐ πᾶς
 5 ἄνθρωπος λευκός, τῇ δὲ τις ἄνθρωπος λευκός ἢ
 οὐδεὶς ἄνθρωπος λευκός· τῇ δὲ ἔστιν ἄνθρωπος
 λευκός ἢ οὐκ ἔστιν ἄνθρωπος λευκός.

Ὅτι μὲν οὖν μιᾷ καταφάσει μία ἀπόφασις ἀντί-
 κειται ἀντιφατικῶς, καὶ τίνες εἰσὶν αὗται, εἴρηται·
 10 καὶ ὅτι αἱ ἐναντίαι ἄλλαι, καὶ τίνες εἰσὶν αὗται,

^a i.e. either distributed or undistributed.

ON INTERPRETATION, VII

for their subjects, as 'Socrates is white' and 'not white.' When, however, the two propositions are not universal in character, albeit about universals, not always do we find it the case that of these one is true, the other false. For, indeed, we can state very truly that man is and man is not white, and that man is and man is not beautiful. If ugly, a man is not beautiful; neither as yet is he beautiful, if he but tends to become so. This view on a summary notice may well seem repugnant to reason, since 'man is not white' would appear the equivalent of 'no man is white.' But they do not, in fact, mean the same, nor, again, are they both of necessity true at the same time or false. It is evident that the denial corresponding to a single affirmation itself must be single as well. The denial, that is, must deny just the thing the affirmation affirms of the selfsame, identical subject. We further require that the subjects be both universal or singular and also that both should be used or not used in their fullest extension.^a 'Socrates is white' and 'not white' constitute in this manner a pair. But if anything else is denied or the subject itself should be changed, though the predicate yet may remain, the denial will not correspond but be one that is simply distinct. To 'every man is white,' for example, 'not every man is white' corresponds, as 'no man is white,' 'man is not white' to 'some men are white,' 'man is white.'

Now to sum up the foregoing statements, we showed that a single negation is opposed to a single affirmation in the manner we called contradictory and also explained which these were. From the class of contradictory propositions we further distinguished the contrary, explaining which these also were. We,

18^a εἴρηται καὶ ὅτι οὐ πᾶσα ἀληθὴς ἡ ψευδὴς ἀντί-
φασις, καὶ διὰ τί, καὶ πότε ἀληθὴς ἡ ψευδὴς.

VIII. Μία δέ ἐστι κατάφασις καὶ ἀπόφασις ἡ
ἐν καθ' ἐνὸς σημαίνουσα, ἡ καθόλου ὄντος καθόλου
ἢ μὴ ὁμοίως, ὡς πᾶς ἄνθρωπος λευκός ἐστιν—
15 οὐκ ἐστι πᾶς ἄνθρωπος λευκός, ἔστιν ἄνθρωπος
λευκός—οὐκ ἐστιν ἄνθρωπος λευκός, οὐδεὶς ἄν-
θρωπος λευκός—ἐστι τις ἄνθρωπος λευκός, εἰ τὸ
λευκὸν ἐν σημαίνει. εἰ δέ δυοῖν ἐν ὄνομα κείται,
ἐξ ὧν μὴ ἐστιν ἓν, οὐ μία κατάφασις,¹ ὡς εἰ
20 τις θεῖτο ὄνομα ἱμάτιον ἵππῳ καὶ ἀνθρώπῳ, τὸ
ἐστιν ἱμάτιον λευκόν, αὕτη οὐ μία κατάφασις οὐδὲ
ἀπόφασις μία. οὐδὲν γὰρ διαφέρει τοῦτο εἰπεῖν
ἢ ἔστιν ἵππος καὶ ἄνθρωπος λευκός. τοῦτο δέ
οὐδὲν διαφέρει τοῦ εἰπεῖν ἔστιν ἵππος λευκός καὶ
ἐστιν ἄνθρωπος λευκός. εἰ οὖν αὗται πολλὰ
25 σημαίνουν καὶ εἰσὶ πολλά, δηλὸν ὅτι καὶ ἡ
πρώτη ἦτοι πολλὰ ἢ οὐδὲν σημαίνει· οὐ γάρ ἐστιν
ὁ τις ἄνθρωπος ἵππος. ὥστε οὐδ' ἐν ταύταις
ἀνάγκη τὴν μὲν ἀληθῆ τὴν δὲ ψευδῇ εἶναι ἀντί-
φασιν.

IX. Ἐπὶ μὲν οὖν τῶν ὄντων καὶ γενομένων
ἀνάγκη τὴν κατάφασιν ἢ τὴν ἀπόφασιν ἀληθῆ ἢ
30 ψευδῇ εἶναι, καὶ ἐπὶ μὲν τῶν καθόλου ὡς καθόλου

¹ B. adds οὐδὲ ἀπόφασις μία.

• Both may be true or both false.

ON INTERPRETATION, VII-IX

moreover, have proved of two opposites that it is not the case always that one must be true and one false, and we set forth the reasons for this and explained the conditions in which one is false, if the other is true.

VIII. A statement is single or one, when it either affirms or denies some one thing and no more of another, be the subject universal or not and the statement universal or not. We may take for examples the following, provided that 'white' has one meaning :

Every man is white.	Not every man is white.
Man is white.	Man is not white.
No man is white.	Some men are white.

If, however, one word has two meanings, which do not combine to make one, the affirmation itself is not one. If, for instance, you gave the name 'garment' alike to a horse and a man, then it follows that 'garment is white' would be not one but two affirmations, as also would 'garment is not white' be not one denial but two. For the statement that 'garment is white' really means 'horse and man both are white.' And this statement, in turn, is the same as to say 'horse is white,' 'man is white.' And if these have more meanings than one and do not, in effect, make one statement, it follows that 'garment is white' must itself have more meanings than one or, if not, it means nothing at all. For no particular man is a horse. And accordingly not even here is one necessarily true and one false of two statements opposed contradictorily.^a

IX. In regard to things present or past, propositions, whether positive or negative, are true of necessity or false. And of those contradictorily

18^a αἰεὶ τὴν μὲν ἀληθῇ τὴν δὲ ψευδῇ εἶναι, καὶ ἐπὶ τῶν καθ' ἕκαστα, ὥσπερ εἴρηται, ἐπὶ δὲ τῶν καθόλου μὴ καθόλου λεχθέντων οὐκ ἀνάγκη· εἴρηται δὲ καὶ περὶ τούτων.

Ἐπὶ δὲ τῶν καθ' ἕκαστα καὶ μελλόντων οὐχ ὁμοίως. εἰ γὰρ πᾶσα κατάφασις καὶ ἀπόφασις
 85 ἀληθῆς ἢ ψευδής, καὶ ἅπαν ἀνάγκη ὑπάρχειν ἢ μὴ ὑπάρχειν, ὥστε εἰ ὁ μὲν φήσει ἔσεσθαι τι ὁ δὲ μὴ φήσει τὸ αὐτὸ τοῦτο, δῆλον ὅτι ἀνάγκη ἀληθεύειν τὸν ἕτερον αὐτῶν, εἰ πᾶσα κατάφασις καὶ ἀπόφασις ἀληθῆς ἢ ψευδής. ἄμφω γὰρ οὐχ ὑπάρξει ἅμα ἐπὶ τοῖς τοιούτοις. εἰ γὰρ ἀληθές
 18^b εἰπεῖν ὅτι λευκὸν ἢ ὅτι οὐ λευκὸν ἔστιν, ἀνάγκη εἶναι λευκὸν ἢ οὐ λευκόν, καὶ εἰ ἔστι λευκὸν ἢ οὐ λευκόν, ἀληθές ἦν φάναι ἢ ἀποφάναι· καὶ εἰ μὴ ὑπάρχει, ψεύδεται, καὶ εἰ ψεύδεται, οὐχ ὑπάρχει,
 5 ὥστε ἀνάγκη ἢ τὴν κατάφασιν ἢ τὴν ἀπόφασιν ἀληθῇ εἶναι ἢ ψευδῇ.

Οὐδὲν ἄρα οὔτε ἔστιν οὔτε γίνεται οὔτε ἀπὸ τύχης οὔθ' ὁπότερ' ἔτυχεν, οὐδὲ ἔσται ἢ οὐκ ἔσται, ἀλλ' ἐξ ἀνάγκης ἅπαντα καὶ οὐχ ὁπότερ' ἔτυχεν. ἢ γὰρ ὁ φᾶς ἀληθεύσει ἢ ὁ ἀποφάς.

* This chapter deals largely with contingency. However, it is hard to determine whether Aristotle held that contingency could anywhere be found in the universe. See W. D. Ross, *Aristotle*, pp. 31, 75-78 and elsewhere.

ON INTERPRETATION, ix

opposed one, again, must be true and one false, when they have a universal for subject and are in themselves universal or else, as we noticed above, have a singular term for their subject. This need not, however, be so in the case of two such propositions as have universals for subjects but are not themselves universal. That question also we discussed.

When, however, we come to propositions whose subjects are singular terms, while their predicates refer to the future and not to the present or past, then we find that the case is quite changed.^a Propositions, whether positive or negative, being themselves true or false, every predicate that we affirm must belong to its subject or not. Hence it is that, if someone declares that a certain event will take place, while another declares it will not, one will clearly be speaking the truth, while the other as clearly will not. Both predicates cannot belong to one subject with regard to the future. For, if it is true to pronounce some particular thing to be white, it must be of necessity white. The reverse of this also holds good. As, again, it is white or not white, it was true to affirm or deny it. And, if it is not, in fact, white, then to say that it is will be false; if to say that it is will be false, then it follows the thing is not white. We are driven, therefore, to concluding that all affirmations and denials must either be true or be false.

Now, if all this is so, there is nothing that happens by chance or fortuitously; nothing will ever so happen. Contingency there can be none; all events come about of necessity. Either the man who maintains that a certain event will take place or the man who maintains the reverse will be speaking the

ὁμοίως γὰρ ἂν ἐγίνετο ἢ οὐκ ἐγίνετο· τὸ γὰρ ὁπότερ' ἔτυχεν οὐδὲν μᾶλλον οὕτως ἢ μὴ οὕτως ἔχει ἢ ἔξει.

- 10 Ἔτι εἰ ἔστι λευκὸν νῦν, ἀληθὲς ἦν εἰπεῖν πρότερον ὅτι ἔσται λευκόν, ὥστε ἀεὶ ἀληθὲς ἦν εἰπεῖν ὅτι οὖν τῶν γενομένων ὅτι ἔστιν ἢ ἔσται. εἰ δὲ ἀεὶ ἀληθὲς ἦν εἰπεῖν ὅτι ἔστιν ἢ ἔσται, οὐχ οἷόν τε τοῦτο μὴ εἶναι οὐδὲ μὴ ἔσθαι. ὁ δὲ μὴ οἷόν τε μὴ γενέσθαι, ἀδύνατον μὴ γενέσθαι· ὁ δὲ
15 ἀδύνατον μὴ γενέσθαι, ἀνάγκη γενέσθαι. ἅπαντα οὖν τὰ ἐσόμενα ἀναγκαῖον γενέσθαι. οὐδὲν ἄρα ὁπότερ' ἔτυχεν οὐδὲ ἀπὸ τύχης ἔσται· εἰ γὰρ ἀπὸ τύχης, οὐκ ἐξ ἀνάγκης.

Ἄλλὰ μὴν οὐδ' ὥς οὐδέτερόν γε ἀληθὲς ἐνδέχεται λέγειν, οἷον ὅτι οὔτε ἔσται οὔτε οὐκ ἔσται. πρῶτον μὲν γὰρ οὔσης τῆς καταφάσεως ψευδοῦς
20 ἢ ἀπόφασις οὐκ ἀληθής, καὶ ταύτης ψευδοῦς οὔσης τὴν κατάφασιν συμβαίνει μὴ ἀληθῆ εἶναι. καὶ πρὸς τούτοις, εἰ ἀληθὲς εἰπεῖν ὅτι λευκὸν καὶ μέγα, δεῖ ἅμφω ὑπάρχειν. εἰ δὲ ὑπάρξει εἰς αὔριον, ὑπάρξειν¹ εἰς αὔριον. εἰ δὲ μήτε ἔσται μήτε μὴ ἔσται αὔριον, οὐκ ἂν εἴη τὸ ὁπότερ' ἔτυχεν, οἷον ναυμαχία· δέοι γὰρ ἂν μήτε γενέσθαι
25 ναυμαχίαν αὔριον μήτε μὴ γενέσθαι.

¹ ὑπάρξει B.

truth on that point. Things could just as well happen as not, if the one or the other assertion is not of necessity true. For as that term is used in regard to both present and future events, the contingent is that which could just as well happen in this way as that.

If, moreover, a thing is now white, then it would have been true in past time to affirm that that thing *would* be white, and thus at all times was it true of whatever has now taken place to affirm that 'it is' or 'will be.' But if it at all times was true to affirm that 'it is' or 'will be,' how impossible that it should not be or not be about to be so! When a thing cannot not come to be, how impossible that it should not! If, again, its not coming to be is impossible, as we assume, come to be then it certainly must. And in consequence future events, as we said, come about of necessity. Nothing is casual, contingent. For if a thing happened by chance, it would not come about of necessity.

We cannot contend, notwithstanding, that neither proposition is true. For example, we cannot contend that a certain event neither will nor will not come to pass in the future. For, first, although one affirmation or denial should prove to be false, yet the other would still not be true. Were it, secondly, true to affirm that the same thing is both white and large, it would have both these marks of necessity. If it will have them to-morrow, it will of necessity have them. But if some event neither will nor will not come to pass on the morrow, contingency there will be none. Let us take, for example, a sea-fight. It is requisite on our hypothesis that it should neither take place nor yet fail to take place on the morrow.

Τὰ μὲν δὴ συμβαίνοντα ἄτοπα ταῦτα καὶ
 τοιαῦτα ἕτερα, εἶπερ πάσης καταφάσεως καὶ ἀπο-
 φάσεως ἢ ἐπὶ τῶν καθόλου λεγομένων ὡς καθόλου
 ἢ ἐπὶ τῶν καθ' ἕκαστον ἀνάγκη τῶν ἀντικειμένων
 εἶναι τὴν μὲν ἀληθῆ τὴν δὲ ψευδῆ, μηδὲν δὲ
 80 ὁπότερ' ἔτυχεν εἶναι ἐν τοῖς γιγνομένοις, ἀλλὰ
 πάντα εἶναι καὶ γίνεσθαι ἐξ ἀνάγκης. ὥστε οὔτε
 βουλευέσθαι δέοι ἂν οὔτε πραγματεύεσθαι, ὡς εἰάν
 μὲν τοδὶ ποιήσωμεν, ἔσται τοδί, εἰάν δὲ μὴ τοδί,
 οὐκ ἔσται τοδί. οὐδὲν γὰρ κωλύει καὶ εἰς μυριο-
 στὸν ἔτος τὸν μὲν φάναι τοῦτο ἔσεσθαι τὸν δὲ μὴ
 85 φάναι, ὥστε ἐξ ἀνάγκης ἔσεσθαι ὅποτερονοῦν
 αὐτῶν ἀληθὲς ἦν εἰπεῖν τότε. ἀλλὰ μὴν οὐδὲ
 τοῦτο διαφέρει, εἴ τινες εἶπον τὴν ἀντίφασιν ἢ
 μὴ εἶπον· δηλὸν γὰρ ὅτι οὕτως ἔχει τὰ πράγματα,
 καὶ μὴ ὅ μὲν καταφήσῃ τι ὁ δὲ ἀποφήσῃ· οὐδὲ
 γὰρ διὰ τὸ καταφαθῆναι ἢ ἀποφαθῆναι ἔσται ἢ
 90 α οὐκ ἔσται, οὐδ' εἰς μυριοστὸν ἔτος μᾶλλον ἢ ἐν
 ὁποσσοῦν χρόνῳ. ὥστε εἰ ἐν ἅπαιτι τῷ χρόνῳ
 οὕτως εἶχεν ὥστε τὸ ἕτερον ἀληθεύεσθαι, ἀναγ-
 καῖον ἦν τοῦτο γενέσθαι, καὶ ἕκαστον τῶν γενο-
 μένων αἰεὶ οὕτως εἶχεν ὥστε ἐξ ἀνάγκης γενέσθαι.
 5 ὁ τε γὰρ ἀληθῶς εἰπέ τις ὅτι ἔσται, οὐχ οἷόν τε
 μὴ γενέσθαι· καὶ τὸ γιγνόμενον ἀληθὲς ἦν εἰπεῖν
 αἰεὶ ὅτι ἔσται.

Εἰ δὴ ταῦτα ἀδύνατα—ὀρώμεν γὰρ ὅτι ἔστιν
 ἀρχὴ τῶν ἐσομένων καὶ ἀπὸ τοῦ βουλευέσθαι καὶ

These and other strange consequences follow, provided we assume in the case of a pair of contradictory opposites having universals for subjects and being themselves universal or having an individual subject, that one must be true, the other false, that contingency there can be none and that all things that are or take place come about in the world by necessity. No need would there be for mankind to deliberate or to take pains, could we make the assumption that if we adopt a particular line, then a certain result will ensue and that, if we do not, it will not. There is nothing to prevent any man from predicting some future event (say) some ten thousand years beforehand, while another predicts the reverse : the event that was truly predicted must needs come to pass at long last. And, indeed, it is quite immaterial whether contradictory predictions were actually made beforehand. For that someone affirmed or denied does not alter the course of events. And events are not caused or prevented by someone's affirming or denying that at some future time they would happen. Nor yet, let us add, does it matter how old the predictions may be. And, in consequence, if through the ages the nature of things has been such that a certain prediction was true, that prediction must needs be fulfilled ; and the nature of all things was such that events came about of necessity. For any event anyone in the past has once truly predicted must needs in due course come about, and of that which has once come about it was true at all times to affirm that it would in due time come about.

All this is, however, impossible. We know from our personal experience that future events may depend on the counsels and actions of men, and that,

- 19 a
 10 ἀπὸ τοῦ πράξαι τι, καὶ ὅτι ὁλως ἔστιν ἐν τοῖς μὴ
 αἰεὶ ἐνεργοῦσι τὸ δυνατόν εἶναι καὶ μὴ, ὁμοίως·
 ἐν οἷς ἄμφω ἐνδέχεται, καὶ τὸ εἶναι καὶ τὸ μὴ
 εἶναι, ὥστε καὶ τὸ γενέσθαι καὶ τὸ μὴ γενέσθαι.
 καὶ πολλὰ ἡμῖν δῆλὰ ἔστιν οὕτως ἔχοντα, οἷον ὅτι
 τουτὶ τὸ ἰμάτιον δυνατόν ἐστι διατμηθῆναι καὶ οὐ
 διατμηθήσεται, ἀλλ' ἐμπροσθεν κατατριβήσεται.
 15 ὁμοίως δὲ καὶ τὸ μὴ διατμηθῆναι δυνατόν· οὐ γὰρ
 ἂν ὑπῆρχε τὸ ἐμπροσθεν αὐτὸ κατατριβῆναι, εἴγε
 μὴ δυνατόν ἦν τὸ μὴ διατμηθῆναι. ὥστε καὶ ἐπὶ
 τῶν ἄλλων γενέσεων, ὅσαι κατὰ δύναμιν λέγονται
 τὴν τοιαύτην. φανερόν ἄρα ὅτι οὐχ ἅπαντα ἐξ
 ἀνάγκης οὕτ' ἔστιν οὔτε γίνεται, ἀλλὰ τὰ μὲν
 20 ὁπότερ' ἔτυχε, καὶ οὐδὲν μᾶλλον ἢ κατάφασις ἢ ἡ
 ἀπόφασις ἀληθής, τὰ δὲ μᾶλλον μὲν καὶ ὡς ἐπὶ τὸ
 πολὺ θάτερον, οὐ μὴν ἀλλ' ἐνδέχεται γενέσθαι καὶ
 θάτερον, θάτερον δὲ μὴ.

Τὸ μὲν οὖν εἶναι τὸ ὄν ὅταν ᾗ, καὶ τὸ μὴ ὄν μὴ
 25 εἶναι ὅταν μὴ ᾗ, ἀνάγκη· οὐ μὴν οὔτε τὸ ὄν ἅπαν
 ἀνάγκη εἶναι οὔτε τὸ μὴ ὄν μὴ εἶναι. οὐ γὰρ
 ταυτόν ἐστι τὸ ὄν ἅπαν εἶναι ἐξ ἀνάγκης ὅτε ἔστι,
 καὶ τὸ ἀπλῶς εἶναι ἐξ ἀνάγκης. ὁμοίως δὲ καὶ
 ἐπὶ τοῦ μὴ ὄντος. καὶ ἐπὶ τῆς ἀντιφάσεως ὁ
 αὐτὸς λόγος. εἶναι μὲν ἢ μὴ εἶναι ἅπαν ἀνάγκη,
 καὶ ἔσεσθαι γε ἢ μὴ· οὐ μέντοι διελόντα γε εἰπεῖν
 θάτερον ἀναγκαῖον. λέγω δὲ οἷον ἀνάγκη μὲν
 30 ἔσεσθαι ναυμαχίαν αὐριον ἢ μὴ ἔσεσθαι, οὐ μέντοι
 ἔσεσθαι γε αὐριον ναυμαχίαν ἀναγκαῖον οὐδὲ μὴ
 γενέσθαι· γενέσθαι μέντοι ἢ μὴ γενέσθαι ἀναγκαῖον.

ON INTERPRETATION, ix

speaking more broadly, those things that are not uninterruptedly actual exhibit a potentiality, that is, a 'may or may not be.' If such things may be or may not be, events may take place or may not. There are many plain cases of this. Thus this coat may be cut in two halves ; yet it may not be cut in two halves. It may wear out before that can happen : then it may not be cut into two. For, unless that were really the case, then its wearing out first were not possible. The same with all other events which in any such sense are potential. Thus it is clear that not everything is or takes place of necessity. Cases there are of contingency ; no truer is then the affirmative, no falser, than the negative statement. Some cases, moreover, we find that, at least, for the most part and commonly, tend in a certain direction, and yet they may issue at times in the other or rarer direction.

What is must needs be when it is ; what is not cannot be when it is not. However, not all that exists any more than all that which does not comes about or exists by necessity. That what is must be when ' it is ' does not mean the same thing as to say that all things come about by necessity. And so, too, with that which is not. And with two contradictory statements the same thing is found to hold good. That is, all things must be or not be, or must come or not come into being, at this or that time in the future. But we cannot determinately say *which* alternative *must* come to pass. For example, a sea-fight must either take place on the morrow or not. No necessity is there, however, that it should come to pass or should not. What is necessary is that it either should happen to-morrow or not. And so, as the

19^a ὥστ' ἐπεὶ ὁμοίως οἱ λόγοι ἀληθεῖς ὥπερ τὰ πράγματα, δῆλον ὅτι ὅσα οὕτως ἔχει ὥστε ὁπότερ'
 85 ἔτυχε καὶ τὰναντία ἐνδέχεσθαι, ἀνάγκη ὁμοίως ἔχειν καὶ τὴν ἀντίφασιν.

Ὅπερ συμβαίνει ἐπὶ τοῖς μὴ αἰεὶ οὖσιν ἢ μὴ αἰεὶ μὴ οὖσιν. τούτων γὰρ ἀνάγκη μὲν θάτερον μῶριον τῆς ἀντιφάσεως ἀληθὲς εἶναι ἢ ψεῦδος, οὐ μέντοι τόδε ἢ τόδε ἀλλ' ὁπότερ' ἔτυχε, καὶ μᾶλλον μὲν ἀληθῇ τὴν ἑτέραν, οὐ μέντοι ἤδη ἀληθῇ ἢ ψευδῇ.
 19^b ὥστε δῆλον ὅτι οὐκ ἀνάγκη πάσης καταφάσεως καὶ ἀποφάσεως τῶν ἀντικειμένων τὴν μὲν ἀληθῇ τὴν δὲ ψευδῇ εἶναι· οὐ γὰρ ὥπερ ἐπὶ τῶν οὐτῶν, οὕτως ἔχει καὶ ἐπὶ τῶν μὴ οὐτῶν μὲν δυνατῶν δὲ εἶναι ἢ μὴ εἶναι, ἀλλ' ὥπερ εἴρηται.

5 X. Ἐπεὶ δέ ἐστὶ τι κατὰ τινος ἢ κατὰφασις σημαίνουσα, τοῦτο δέ ἐστιν ἢ ὄνομα ἢ τὸ ἀνώνυμον, ἐν δὲ δεῖ εἶναι καὶ καθ' ἑνὸς τὸ ἐν τῇ καταφάσει (τὸ δὲ ὄνομα εἴρηται καὶ τὸ ἀνώνυμον πρότερον· τὸ γὰρ οὐκ ἄνθρωπος ὄνομα μὲν οὐ λέγω ἀλλ' ἀόριστον ὄνομα· ἐν γὰρ πως σημαίνει καὶ τὸ
 10 ἀόριστον· ὥπερ καὶ τὸ οὐχ ὑγιαίνει οὐ ῥῆμα ἀλλ' ἀόριστον ῥῆμα), ἔσται πᾶσα κατὰφασις καὶ ἀπόφασις ἢ ἐξ ὀνόματος καὶ ῥήματος ἢ ἐξ ἀορίστου ὀνόματος καὶ ῥήματος. ἀνευ δὲ ῥήματος οὐδεμία κατὰφασις οὐδὲ ἀπόφασις· τὸ γὰρ ἐστὶν ἢ ἔσται ἢ ἦν ἢ γίνεται, ἢ ὅσα ἄλλα τοιαῦτα, ῥήματα ἐκ
 15 τῶν κειμένων ἐστὶ· προσσημαίνει γὰρ χρόνον.

ON INTERPRETATION, IX-X

truth of propositions consists in corresponding with facts, it is clear in the case of events where contingency or potentiality in opposite directions is found that the two contradictory statements about them will have the same character.

With what is not always existent or not at all times non-existent we find this exactly the case. For one half of the said contradiction must be true and the other half false. But we cannot say which half is which. Though it may be that one is more probable, it cannot be true yet or false. There is evidently, then, no necessity that one should be true, the other false, in the case of affirmations and denials. For the case of those things which as yet are potential, not actually existent, is different from that of things actual. It is as we stated above.

X. An affirmative proposition is one that states something of something. The subject is either a noun or a something not possessed of a name, and of subject and predicate either must signify only one thing. We explained what we meant by a noun and by what has no name of its own. For we said that 'not-man,' for example, was not, strictly speaking, a noun, and we called such 'indefinite nouns,' since they do in a manner at least signify or denote single things. In like manner, the phrase 'is not healthy' is not, strictly speaking, a verb, and we called such 'indefinite verbs.' Thus affirmative and negative judgements consist of a noun and a verb, whether strictly so called or indefinite. Unless there is also a verb, there is no affirmation nor denial. For expressions like 'is,' 'will be,' 'was,' 'comes to be' and so forth are all verbs upon our definition of the word, for beside their particular meaning they have

19 b

ὥστε πρώτη ἔσται κατάφασις καὶ ἀπόφασις τὸ
 ἔστιν ἄνθρωπος—οὐκ ἔστιν ἄνθρωπος, εἴτα ἔστιν
 οὐκ ἄνθρωπος—οὐκ ἔστιν οὐκ ἄνθρωπος, πάλιν
 ἔστι πᾶς ἄνθρωπος—οὐκ ἔστι πᾶς ἄνθρωπος, ἔστι
 πᾶς οὐκ ἄνθρωπος—οὐκ ἔστι πᾶς οὐκ ἄνθρωπος.
 καὶ ἐπὶ τῶν ἐκτὸς δὲ χρόνων ὁ αὐτὸς λόγος.

20

Ὅταν δὲ τὸ ἔστι τρίτον προσκατηγορῇται, ἤδη
 διχῶς λέγονται αἱ ἀντιθέσεις. λέγω δὲ οἶον ἔστι
 δίκαιος ἄνθρωπος· τὸ ἔστι τρίτον φημὶ συγκεῖσθαι
 ὄνομα ἢ ῥῆμα ἐν τῇ καταφάσει. ὥστε διὰ τοῦτο
 τέτταρα ἔσται ταῦτα, ὧν τὰ μὲν δύο πρὸς τὴν
 κατάφασιν καὶ ἀπόφασιν ἔξει κατὰ τὸ στοιχοῦν
 ὡς αἱ στερήσεις, τὰ δὲ δύο οὐ. λέγω δ' ὅτι τὸ

25

ἔστιν ἢ τῷ δικαίῳ προσκείσεται ἢ τῷ οὐ δικαίῳ,
 ὥστε καὶ ἡ ἀπόφασις. τέτταρα οὖν ἔσται. νοοῦμεν
 δὲ τὸ λεγόμενον ἐκ τῶν ὑπογεγραμμένων. ἔστι
 δίκαιος ἄνθρωπος· ἀπόφασις τούτου, οὐκ ἔστι
 δίκαιος ἄνθρωπος. ἔστιν οὐ-δίκαιος ἄνθρωπος·
 τούτου ἀπόφασις, οὐκ ἔστιν οὐ-δίκαιος ἄνθρωπος.
 τὸ γὰρ ἔστιν ἐνταῦθα καὶ τὸ οὐκ ἔστι τῷ δικαίῳ

30

προσκείσεται καὶ τῷ οὐ δικαίῳ. ταῦτα μὲν οὖν,
 ὥσπερ ἐν τοῖς Ἀναλυτικοῖς λέγεται, οὕτω τέτακ-
 ται. ὁμοίως δὲ ἔχει καὶ καθόλου τοῦ ὀνόματος ἢ
 ἢ κατάφασις, οἶον πᾶς ἔστιν ἄνθρωπος δίκαιος.
 ἀπόφασις τούτου, οὐ πᾶς ἔστιν ἄνθρωπος δίκαιος.

35

πᾶς ἔστιν ἄνθρωπος οὐ δίκαιος—οὐ πᾶς ἔστιν

* Called *tertii adiacentis*, 'propositions of the third adjacent,' by later logicians.

ON INTERPRETATION, x

a time-reference also. And, therefore, 'man is,' 'man is not,' form the first affirmation and denial. 'Not-man is,' 'not-man is not' follow. Again, we have these propositions, 'every man is' and 'every not-man is'—'every man is not,' 'every not-man is not.' Just the same reasoning applies in regard to times future and past.

Where there are two other terms and the term 'is' is used as a third, there are possible two distinct types of affirmative and negative statements.^a We take 'man is just' for example. The word 'is' is here a third term, be it called verb or noun, in the sentence. And, therefore, from these terms or factors we form in all four propositions. Two correspond in their sequence, in respect of affirmation and denial, with those propositions or judgements which refer to a state of privation. The others, however, do not. Supposing, I mean, the verb 'is' to be added to 'just' or 'not just,' we shall have two affirmative judgements; supposing that 'is not' is added, we then have two negative judgements. Together these make up the four. This the subjoined examples make clear:—

Affirmations

Man is just.

Man is not-just.

Negations

Man is not just.

Man is not not-just.

Now 'is' and 'is not' in these cases are added to 'just' or 'not-just.' In this way are these statements arranged, as we said in the *Prior Analytics*. Supposing the subject distributed, we find that the rule is the same:—

Affirmations

Every man is just.

Every man is not-just.

Negations

Not every man is just.

Not every man is not-just.

19 b

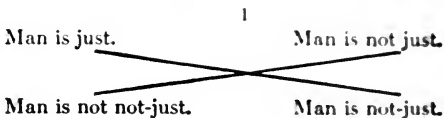
ἄνθρωπος οὐ δίκαιος. πλὴν οὐχ ὁμοίως τὰς κατὰ διάμετρον ἐνδέχεται συναληθεύειν· ἐνδέχεται δὲ ποτέ.

Αὗται μὲν οὖν δύο αἰτίκωνται, ἄλλαι δὲ δύο πρὸς τὸ οὐκ ἄνθρωπος ὡς ὑποκείμενόν τι προστεθέντος,¹ ἔστι δίκαιος οὐκ-ἄνθρωπος—οὐκ ἔστι δίκαιος οὐκ-ἄνθρωπος, ἔστιν-οὐ δίκαιος οὐκ-ἄνθρωπος—οὐκ ἔστιν οὐ-δίκαιος οὐκ-ἄνθρωπος. πλείους δὲ τούτων οὐκ ἔσονται ἀντιθέσεις. αὗται δὲ χωρὶς ἐκείνων αὐταὶ καθ' ἑαυτὰς ἔσονται, ὡς ὀνόματι τῷ οὐκ ἄνθρωπος χρώμεναι.

Ἐφ' ὅσων δὲ τὸ ἔστι μὴ ἀρμόττει, οἷον ἐπὶ τοῦ ὑγιαίνει καὶ βαδίζει, ἐπὶ τούτων τὸ αὐτὸ ποιεῖ οὕτω τιθέμενον ὡς ἂν εἰ τὸ ἔστι προσήπτετο, οἷον ὑγιαίνει πᾶς ἄνθρωπος—οὐχ ὑγιαίνει πᾶς ἄνθρωπος, ὑγιαίνει πᾶς οὐκ ἄνθρωπος—οὐχ ὑγιαίνει πᾶς οὐκ

¹ προστεθέν B.

^a I give the text here as it stands. But there should be some tables arranging all these eight propositions in the order we find in the *Prior Analytics*, 51 b 36. Hence the reference here to that text. But, if tables there were in the Greek at one time, they are no longer there. And 'the statements diagonally joined' are no longer diagonally joined. And in each case the four propositions are differently arranged in the Greek from the order in the *Prior Analytics*, as the reader will see from the following, that stand for the three missing schemes:—



ON INTERPRETATION, x

There is no possibility here, in the same way as in the first case, that the statements diagonally joined in the scheme should be both of them true. None the less, they may sometimes be so.

Thus two pairs of opposed propositions have duly been set out above, and two others will follow, provided a third term is added to 'not-man,' regarded as some sort of subject :—

Affirmations

Negations

Not-man is just.

Not-man is not just.

Not-man is not-just.

Not-man is not not-just.

More pairs of opposed propositions cannot be discovered than these. But the last of these groups should be viewed as distinct from the two that precede it from its having 'not-man' for a subject.^a

Where 'is' does not suit as a verb and we use 'walks,' 'has health' and the like, then the same sort of scheme is produced as we get, when the verb 'is' is used. We have, for example, the following :—

Every man is healthy. Every man is not healthy.
Every not-man is healthy. Every not-man is not healthy.

2

Every man is just.

Not every man is just.

Not every man is not-just.

Every man is not-just.

3

Not-man is just.

Not-man is not just.

Not-man is not not-just.

Not-man is not-just.

The diagonal lines in each scheme are intended, therefore, to connect the affirmations and denials respectively.

20^a ἄνθρωπος. οὐ γάρ ἐστι τὸ οὐ πᾶς ἄνθρωπος
 λεκτέον, ἀλλὰ τὸ οὐ, τὴν ἀπόφασιν, τῷ ἄνθρωπος
 προσθετέον. τὸ γὰρ πᾶς οὐ τὸ καθόλου σημαίνει,
 10 ἄλλ' ὅτι καθόλου. δῆλον δὲ ἐκ τοῦδε, ὑγιαίνει
 ἄνθρωπος—οὐχ ὑγιαίνει ἄνθρωπος, ὑγιαίνει οὐκ
 ἄνθρωπος—οὐχ ὑγιαίνει οὐκ ἄνθρωπος. ταῦτα γὰρ
 ἐκείνων διαφέρει τῷ μὴ καθόλου εἶναι. ὥστε τὸ
 πᾶς ἢ οὐδεὶς οὐδὲν ἄλλο προσσημαίνει ἢ ὅτι
 καθόλου τοῦ ὀνόματος ἢ κατὰφασιν ἢ ἀπόφασιν.
 15 τὰ δὲ ἄλλα τὰ αὐτὰ δεῖ προστιθέναι.

Ἐπεὶ δὲ ἐναντία ἀπόφασις ἐστι τῇ ἅπαν ἐστὶ
 ζῶον δίκαιον ἢ σημαίνουσα ὅτι οὐδὲν ἐστὶ ζῶον
 δίκαιον, αὗται μὲν φανερόν ὅτι οὐδέποτε ἔσονται
 οὔτε ἀληθεῖς ἅμα οὔτε ἐπὶ τοῦ αὐτοῦ, αἱ δὲ ἀντι-
 κείμεναι ταύταις ἔσονται ποτε, οἷον οὐ πᾶν ζῶον
 20 δίκαιον καὶ ἔστι τι ζῶον δίκαιον. ἀκολουθοῦσι δὲ
 αὗται, τῇ μὲν πᾶς ἄνθρωπος οὐ δίκαιός ἐστιν ἢ
 οὐδεὶς ἐστὶν ἄνθρωπος δίκαιος, τῇ δὲ ἔστι τις
 ἄνθρωπος δίκαιος ἢ ἀντικειμένη ὅτι οὐ πᾶς ἄν-
 θρωπός ἐστιν οὐ δίκαιος· ἀνάγκη γὰρ εἶναι τινα.

Φανερόν δὲ καὶ ὅτι ἐπὶ μὲν τῶν καθ' ἕκαστον,
 εἰ ἀληθὲς ἐρωτηθέντα ἀποφῆσαι, ὅτι καὶ κατα-
 25 φῆσαι ἀληθές· οἷον ἄρα γε Σωκράτης σοφός; οὐ.
 Σωκράτης ἄρα οὐ σοφός. ἐπὶ δὲ τῶν καθόλου

ON INTERPRETATION, x

We must always beware in such cases of speaking of 'not every man.' For the 'not' must be added to 'man,' since the subject is not a universal in virtue of having an 'every,' but the adjective 'every' indicates that the subject, as such, is distributed. This will be seen from the following :

Man is healthy.	Man is not healthy.
Not-man is healthy.	Not-man is not healthy.

These differ from the former propositions on account of their being indefinite and not universal in form. Thus the adjectives 'every' and 'no' signify nothing more than the fact, be the statement affirmative or negative, that the subject itself is distributed. The rest of the statement will, therefore, remain in all cases unchanged.

'Every animal is just' has for contrary the statement 'no animal is just'; it is clear, then, these two propositions can never hold good of one subject nor ever together be true. But their two contradictories will sometimes turn out to be both of them true. That is, 'not every animal is just' and 'some animals are just' are both true. Then from 'every man is not-just' there follows the statement that 'no man is just'; 'not every man is not-just,' its opposite, follows from 'some men are just.' For there must, indeed, be some just men.

When the subject is individual, provided a question is asked and the negative answer is true, then a certain affirmative statement must also manifestly be true. Take the question 'Is Socrates wise?' Let the negative answer be true. 'Socrates then is unwise' can at once be correctly inferred. In the case of universals, however, not a similar but a negative

- 20 a οὐκ ἀληθὴς ἢ ὁμοίως λεγομένη, ἀληθὴς δὲ ἢ ἀπόφασις, οἷον ἄρα γε πᾶς ἄνθρωπος σοφός; οὐ. πᾶς ἄρα ἄνθρωπος οὐ σοφός· τοῦτο γὰρ ψεῦδος.
 30 ἀλλὰ τὸ οὐ πᾶς ἄρα ἄνθρωπος σοφός ἀληθές· αὕτη δὲ ἐστὶν ἡ ἀντικειμένη, ἐκείνη δὲ ἡ ἐναντία.

Αἰ δὲ κατὰ τὰ ἀόριστα ἀντικείμενα ὀνόματα καὶ ῥήματα, οἷον ἐπὶ τοῦ μὴ ἄνθρωπος καὶ μὴ δίκαιος, ὥσπερ ἀποφάσεις ἄνευ ὀνόματος καὶ ῥήματος δόξειαν ἂν εἶναι. οὐκ εἰσὶ δέ· αἰ γὰρ ἀληθεύειν
 35 ἀνάγκη ἢ ψεύδεσθαι τὴν ἀπόφασιν, ὃ δ' εἰπὼν οὐκ ἄνθρωπος οὐδὲν μᾶλλον τοῦ εἰπόντος ἄνθρωπος ἀλλὰ καὶ ἦττον ἡλήθευκέ τι ἢ ἔψευσται, ἐὰν μή τι προστεθῇ. σημαίνει δὲ τὸ ἔστι πᾶς οὐκ-ἄνθρωπος δίκαιος οὐδεμιᾷ ἐκείνων ταυτὸν, οὐδὲ ἡ ἀντικειμένη ταύτη ἢ οὐκ ἔστι πᾶς οὐκ-ἄνθρωπος δίκαιος· τὸ δὲ πᾶς οὐ δίκαιος οὐκ ἄνθρωπος τῷ οὐδεὶς δίκαιος
 40 οὐκ ἄνθρωπος ταυτὸν σημαίνει.

- 20 b Μετατιθέμενα δὲ τὰ ὀνόματα καὶ τὰ ῥήματα ταυτὸν σημαίνει, οἷον ἔστι λευκὸς ἄνθρωπος, ἔστιν ἄνθρωπος λευκός. εἰ γὰρ μὴ τοῦτό ἐστι, τοῦ αὐτοῦ πλείους ἔσονται ἀποφάσεις. ἀλλ' ἐδέδεικτο ὅτι μία μιᾶς. τοῦ μὲν γὰρ ἔστι λευκὸς ἄνθρωπος
 5 ἀπόφασις τὸ οὐκ ἔστι λευκὸς ἄνθρωπος· τοῦ δὲ ἔστιν ἄνθρωπος λευκός, εἰ μὴ ἡ αὕτη ἐστὶ τῇ ἔστι λευκὸς ἄνθρωπος, ἔσται ἀπόφασις ἥτοι τὸ οὐκ ἔστιν οὐκ ἄνθρωπος λευκός ἢ τὸ οὐκ ἔστιν ἄν-

* Meaning, of the positive answer to the question as opposed to the negative.

^b That is, 'man' is regarded in both as constituting the grammatical subject, the inversion being purely 'rhetorical.' The order of words would, however, depend in a definite context on the primary interest of the speaker. It depends

ON INTERPRETATION, x

inference would rather appear to be true. If the negative answer is true to the question 'Is every man wise?' to infer that 'every man is unwise' would, in those circumstances, be false, and 'not every man is wise' is correct. The latter is the contradictory and the former the contrary statement.^a

Indefinite predicates and nouns, such, for instance, as 'not-man,' 'not-just,' might appear to be actual negations without any noun, any verb, as those terms are more properly used. This, however, is not really so. Of necessity every negation must either be true or be false, and whoever says 'not-man,' for instance, provided that nothing is added, is speaking not more but less truly or falsely than he who says 'man.' 'Every not-man is just' is a statement, which is not in its meaning equivalent to any proposition we mentioned, nor yet is its contradictory or 'not every not-man is just.' 'Every not-man is not just,' however, amounts to the same thing as saying that 'nothing that is not man is just.'

You can transpose the subject and predicate. No change in the meaning, however, of the sentence is thereby involved. Thus we say 'man is white,' 'white is man.'^b For, if these did not mean the same thing, we should have more negations than one corresponding to the same affirmation. But we showed there was one and one only. Of 'man is white,' that is to say, the negation is 'man is not white,' and of 'white is man,' if we suppose that it differs in some way in sense, 'white is not man' or 'white

on his *interest* whether he will say in a definite context, 'So-and-so is Prime Minister of England,' or will put it the other way round. But to go into such points would raise the whole question of Aristotle's logic, its character and actual relation to concrete and live human thinking.

20^b θρωπος λευκός. ἀλλ' ἡ ἑτέρα μὲν ἐστὶν ἀπόφασις
 τοῦ ἐστὶν οὐκ ἄνθρωπος λευκός, ἡ ἑτέρα δὲ τοῦ
 10 ἐστὶ λευκός ἄνθρωπος, ὥστε ἔλονται δύο μιᾶς.
 ὅτι μὲν οὖν μετατιθεμένου τοῦ ὀνόματος καὶ τοῦ
 ῥήματος ἡ αὐτὴ γίνεται κατάφασις καὶ ἀπόφασις,
 δῆλον.

XI. Τὸ δὲ ἐν κατὰ πολλῶν ἢ πολλὰ καθ' ἐνὸς
 15 καταφάναι ἢ ἀποφάναι, εἴαν μὴ ἐν τι ἢ τὸ ἐκ τῶν
 πολλῶν δηλούμενον, οὐκ ἐστὶ κατάφασις μία οὐδὲ
 ἀπόφασις. λέγω δὲ ἐν οὐκ εἴαν ὄνομα ἐν ἡ κεί-
 μενον, μὴ ἢ δὲ ἐν τι ἐξ ἐκείνων, οἷον ὁ ἄνθρωπος
 ἴσως ἐστὶ καὶ ζῶον καὶ δίπουν καὶ ἡμερον, ἀλλὰ
 καὶ ἐν τι γίνεται ἐκ τούτων· ἐκ δὲ τοῦ λευκοῦ
 καὶ τοῦ ἀνθρώπου καὶ τοῦ βαδίζειν οὐχ ἐν. ὥστε
 20 οὗτ' εἴαν ἐν τι κατὰ τούτων καταφήσῃ τις μία
 κατάφασις, ἀλλὰ φωνὴ μὲν μία καταφάσεις δὲ
 πολλαί, οὔτε εἴαν καθ' ἐνὸς ταῦτα, ἀλλ' ὁμοίως
 πολλαί.

Εἰ οὖν ἡ ἐρώτησις ἡ διαλεκτικὴ ἀποκρίσεώς
 ἐστὶν αἵτησις, ἢ τῆς προτάσεως ἢ θατέρου μορίου
 τῆς ἀντιφάσεως, ἢ δὲ πρότασις ἀντιφάσεως μιᾶς
 μόριον, οὐκ ἂν εἴη ἀποκρίσις μία πρὸς ταῦτα·
 25 οὐδὲ γὰρ ἡ ἐρώτησις μία, οὐδ' εἴαν ἢ ἀληθής.
 εἴρηται δὲ ἐν τοῖς Τοπικοῖς περὶ αὐτῶν. ἅμα δὲ
 δῆλον ὅτι οὐδὲ τὸ τί ἐστὶν ἐρώτησις ἐστὶ διαλεκτι-
 κή· δεῖ γὰρ δεδόσθαι ἐκ τῆς ἐρωτήσεως ἐλέσθαι
 ὁπότερον βούλεται τῆς ἀντιφάσεως μόριον ἀπο-
 φήνασθαι. ἀλλὰ δεῖ τὸν ἐρωτῶντα προσδιορίσαι
 80 πότερον τόδε ἐστὶν ὁ ἄνθρωπος ἢ οὐ τοῦτο.

Ἐπεὶ δὲ τὰ μὲν κατηγορεῖται συντιθέμενα, ὥς

is not not-man.' For the former negates 'man is white,' and the latter negates 'white is not-man.' There will, therefore, be two contradictories of one and the same affirmation. To transpose the subject and predicate, therefore, makes no alteration in the sense of affirmations and denials.

XI. A proposition is not one but several that predicates one thing of many or many of one and the same in a positive or negative manner, unless what the many denote, in reality, is only one thing. I am not using 'one' of such things as do not, although having one name, coalesce into one total unity. Man is animal, biped, domesticated: these coalesce into one, whereas 'white,' 'man' and 'walking' do not. Should we predicate these of one subject or affirm a single predicate of them, the resulting proposition would be single in no sense except the linguistic.

If, then, the dialectical question consists in requesting an answer—the granting, that is, of a premiss or of one out of two contradictories (such as each premiss itself is)—the answer to any such question as contains the aforementioned predicates cannot be one proposition. Though the answer sought for may be true, yet the question is not one but several. But this I explained in my *Topics*.^a At the same time the question 'what is it?' is not a dialectical question. And this will be clear from the fact that the question ought so to be framed as to give the respondent the chance to enunciate whichever he pleases of two contradictory answers. The question must be made more specific, inquiring, for example, whether man has or has not some definite quality.

In certain combinations of predicates we find that

20 b ἐν τὸ πᾶν κατηγορήματα τῶν χωρὶς κατηγορουμένων,
 τὰ δ' οὐ, τίς ἢ διαφορά; κατὰ γὰρ τοῦ ἀνθρώπου
 ἀληθὲς εἰπεῖν καὶ χωρὶς ζῶον καὶ χωρὶς δίπουν,
 85 καὶ ταῦτα ὥς ἐν, καὶ ἄνθρωπον καὶ λευκόν, καὶ
 ταῦθ' ὥς ἐν. ἀλλ' οὐχί, εἰ σκυτεὺς καὶ ἀγαθός,
 καὶ σκυτεὺς ἀγαθός. εἰ γάρ, ὅτι ἐκάτερον ἀληθές,
 εἶναι δεῖ καὶ τὸ συνάμφω, πολλὰ καὶ ἄτοπα ἔσται.
 κατὰ γὰρ τοῦ ἀνθρώπου καὶ τὸ ἄνθρωπος ἀληθές
 καὶ τὸ λευκόν, ὥστε καὶ τὸ ἅπαν. πάλιν εἰ τὸ
 40 λευκὸν αὐτό, καὶ τὸ ἅπαν, ὥστε ἔσται ἄνθρωπος
 21 α λευκὸς λευκός, καὶ τοῦτο εἰς ἄπειρον. καὶ πάλιν
 μουσικὸς λευκὸς βαδίζων· καὶ ταῦτα πολλάκις
 πεπλεγμένα.¹ ἔτι εἰ ὁ Σωκράτης Σωκράτης καὶ
 ἄνθρωπος, καὶ Σωκράτης ἄνθρωπος.² καὶ εἰ
 5 ἄνθρωπος καὶ δίπους, καὶ ἄνθρωπος δίπους.³

Ὅτι μὲν οὖν εἴ τις ἀπλῶς φήσει τὰς συμπλοκάς
 γίνεσθαι, πολλὰ συμβαίνει λέγειν ἄτοπα, δῆλον·
 ὅπως δὲ θετέον, λέγομεν νῦν.

Τῶν δὲ κατηγορουμένων, καὶ ἐφ' οἷς κατηγορεῖ-
 10 σθαι συμβαίνει, ὅσα μὲν λέγεται κατὰ συμβεβηκὸς
 ἢ κατὰ τοῦ αὐτοῦ ἢ θάτερον κατὰ θατέρου, ταῦτα
 οὐκ ἔσται ἐν, οἷον ἄνθρωπος λευκός ἐστι καὶ
 μουσικός, ἀλλ' οὐχ ἐν τὸ λευκὸν καὶ τὸ μουσικόν·
 συμβεβηκότα γὰρ ἄμφω τῷ αὐτῷ. οὐδ' εἰ τὸ
 λευκὸν μουσικὸν ἀληθὲς εἰπεῖν, ὅμως οὐκ ἔσται
 τὸ μουσικὸν λευκὸν ἐν τι· κατὰ συμβεβηκὸς γὰρ

¹ B. adds εἰς ἄπειρον.

² καὶ Σωκράτης Σωκράτης ἄνθρωπος B.

³ καὶ ἄνθρωπος ἄνθρωπος δίπους B.

the separate predicates fuse themselves into one predicate ; in others, again, they do not. How, we ask, does this difference arise ? We can either use two propositions and state, first, that man is an animal, secondly, that man is a biped, or, combining the two into one, state that man is a two-footed animal. So we may use 'man' and 'white.' This is not so with 'cobbler' and 'good.' Though a man is a cobbler and good, yet we cannot combine them together and pronounce him also 'a good cobbler.' For if we can say that, whenever both predicates, separately taken, are truly affirmed of one subject, both also, when taken together, are truly affirmed of that subject, then many absurdities follow. A man is a man and is white. He will, therefore, be also a white man. And, if he is white, then it follows the composite also is white, which will give us 'a white, white man,' and so we go on to infinity. Take 'musical,' 'walking' and 'white': these may all be combined many times. And of Socrates, too, we may say 'he is Socrates,' 'he is a man,' and is, therefore, the man Socrates. We may call him a man and a biped and, therefore, a two-footed man.

To maintain, then, that predicates can always be combined without any exception leads clearly to many absurdities. Let us, then, state the real case.

Predicates, if accidental to the subject or one to the other, do not coalesce into one. We may say 'man is musical and white.' Being musical and whiteness, however, do not coalesce into one, being both accidental to the subject. Nor, even if everything white could be truly said to be musical, would 'musical' and 'white' form a unity ; for only, indeed, incidentally is that which is musical white.

^{21 a}
¹⁵ τὸ μουσικὸν λευκόν, ὥστε οὐκ ἔσται τὸ λευκὸν μουσικὸν ἔν τι. διὸ οὐδ' σκυτεὺς¹ ἀπλῶς ἀγαθός, ἀλλὰ ζῶον δίπουν· οὐ γὰρ κατὰ συμβεβηκός.

Ἔτι οὐδ' ὅσα ἐνυπάρχει ἐν τῷ ἐτέρῳ. διὸ οὔτε τὸ λευκὸν πολλάκις οὔτε ὁ ἄνθρωπος ἄνθρωπος ζῶόν ἐστιν ἢ δίπουν· ἐνυπάρχει γὰρ ἐν τῷ ἀνθρώπῳ τὸ ζῶον καὶ τὸ δίπουν. ἀληθές δέ ἐστιν εἰπεῖν

²⁰ κατὰ τοῦ τινὸς καὶ ἀπλῶς, οἷον τὸν τινὰ ἄνθρωπον ἄνθρωπον ἢ τὸν τινὰ λευκὸν ἄνθρωπον ἄνθρωπον λευκόν· οὐκ αἰεὶ δέ, ἀλλ' ὅταν μὲν ἐν τῷ προσκειμένῳ τῶν ἀντικειμένων τι ἐνυπάρχη ᾧ ἔπεται ἀντίφασις, οὐκ ἀληθές ἀλλὰ ψεῦδος, οἷον τὸν τεθνεῶτα ἄνθρωπον ἄνθρωπον εἰπεῖν, ὅταν δὲ μὴ ἐνυπάρχη, ἀληθές. ἢ ὅταν μὲν ἐνυπάρχη, αἰεὶ οὐκ
²⁵ ἀληθές, ὅταν δὲ μὴ ἐνυπάρχη, οὐκ αἰεὶ ἀληθές, ὥσπερ Ὀμηρός ἐστὶ τι, οἷον ποιητής. ἄρ' οὖν καὶ ἔστιν, ἢ οὐ; κατὰ συμβεβηκός γὰρ κατηγορεῖται τοῦ Ὀμήρου τὸ ἔστιν· ὅτι γὰρ ποιητής ἐστιν, ἀλλ' οὐ καθ' αὐτό, κατηγορεῖται κατὰ τοῦ Ὀμήρου τὸ ἔστιν.

³⁰ Ὡστε ἐν ὅσαις κατηγορίαις μήτε ἐναντιότης ἔνεστιν, εἴαν λόγοι αὐτ' ὀνομάτων λέγωνται, καὶ καθ' ἑαυτὰ κατηγορῆται καὶ μὴ κατὰ συμβεβηκός,

¹ ὁ σκυτεὺς B.

* Otherwise, in the sense of existence. For the word 'is' expresses 'exists' in addition to being the copula.

And so being musical and whiteness will not coalesce into one. If a man is both good and a cobbler, we cannot combine the two terms and thus call him also 'a good cobbler.' But we can combine 'animal' and 'biped' and call man a two-footed animal; for these terms are not accidental.

Again, predicates cannot form one, of which one is implied in the other. So we cannot combine 'white' repeatedly with that which already contains it or call a man animal-man, for example, or two-footed man. That is, 'animal' and 'biped' are notions already implicit in 'man.' But we certainly *can* use a predicate simply of one single case, saying this or that man is a man, a particular white man a white man. Not always is this so, however. When we find in the adjunct some opposite such as implies contradictories, we then should speak falsely, not truly, in making the simple predication, as in calling a dead man a man. Where there is, on the contrary, no opposite, the simple predication will be true. Or we might rather put the case thus. For, supposing that there is an opposite, we cannot make the simple predication; where, however, there is no such opposite, we still cannot always do so. For example, take 'Homer is something'—'a poet' will do for our purpose. But can we say also 'he *is*'? Or will that be incorrectly inferred? 'Is' was used incidentally here. For our statement was 'he is a poet,' and 'is' was not predicated of him in the substantive sense of the word.^a

Therefore, in those predications having no contradiction inherent, if nouns are replaced by definitions and the predicates are not accidental, belonging to

21 ^a ἐπὶ τούτων τὸ τί καὶ ἀπλῶς ἀληθὲς ἔσται εἰπεῖν.
τὸ δὲ μὴ ὄν, ὅτι δοξαστόν, οὐκ ἀληθὲς εἰπεῖν ὄν
τι· δόξα γὰρ αὐτοῦ οὐκ ἔστιν ὅτι ἔστιν, ἀλλ' ὅτι
οὐκ ἔστιν.

XII. Τούτων δὲ διωρισμένων σκεπτέον ὅπως
85 ἔχουσιν αἱ ἀποφάσεις καὶ καταφάσεις πρὸς ἀλλήλας
αἱ τοῦ δυνατόν εἶναι καὶ μὴ δυνατόν καὶ ἐνδεχόμενον
καὶ μὴ ἐνδεχόμενον, καὶ περὶ τοῦ ἀδυνάτου τε
καὶ ἀναγκαίου· ἔχει γὰρ ἀπορίας τινάς. εἰ γὰρ
τῶν συμπλεκομένων αὐταὶ ἀλλήλαις ἀντίκεινται
ἀντιφάσεις, ὅσαι κατὰ τὸ εἶναι καὶ μὴ εἶναι τὰτ-
21 ^b τονται, οἷον τοῦ εἶναι ἄνθρωπον ἀπόφασις τὸ μὴ
εἶναι ἄνθρωπον, οὐ τὸ εἶναι μὴ ἄνθρωπον, καὶ τοῦ
εἶναι λευκὸν ἄνθρωπον τὸ μὴ εἶναι λευκὸν ἄνθρω-
πον, ἀλλ' οὐ τὸ εἶναι μὴ λευκὸν ἄνθρωπον. εἰ
γὰρ κατὰ παντὸς ἢ κατάφασις ἢ ἡ ἀπόφασις, τὸ
6 ξύλον ἔσται ἀληθὲς εἰπεῖν εἶναι μὴ λευκὸν ἄν-
θρωπον. εἰ δὲ τοῦτο οὕτως, καὶ ὅσοις τὸ εἶναι
μὴ προστίθεται, τὸ αὐτὸ ποιήσει τὸ ἀντὶ τοῦ εἶναι
λεγόμενον, οἷον τοῦ ἄνθρωπος βαδίζει οὐ τὸ οὐκ
ἄνθρωπος βαδίζει ἀπόφασις ἔσται, ἀλλὰ τὸ οὐ
βαδίζει ἄνθρωπος· οὐδὲν γὰρ διαφέρει εἰπεῖν
10 ἄνθρωπον βαδίζειν ἢ ἄνθρωπον βαδίζοντα εἶναι.
ὥστε εἰ οὕτως πανταχοῦ, καὶ τοῦ δυνατόν εἶναι
ἀπόφασις ἔσται τὸ δυνατόν μὴ εἶναι, ἀλλ' οὐ τὸ
μὴ δυνατόν εἶναι.

Δοκεῖ δὲ τὸ αὐτὸ δύνασθαι καὶ εἶναι καὶ μὴ
εἶναι· πᾶν γὰρ τὸ δυνατόν τέμνεσθαι ἢ βαδίζειν

^a 'A log is a white man' is false : the contradictory, then, must be true, or 'a log is a not-white man,' provided that

ON INTERPRETATION, XI-XII

the things in themselves, the individual may well be the subject also of the simple propositions. As, however, for that which is *not*, it is not true to say it 'is' somewhat, because it is matter of opinion. The opinion about it is not that it is ; it is that it is not.

XII. Having made the foregoing distinctions, we must prove the relations subsisting between affirmations and denials affirming or denying the possible, contingent, impossible, necessary—a question not wanting in difficulty. Grant that those composite expressions containing the verbs 'is' and 'is not' are mutually contradictory. Take, for example, 'man is' ; 'man is not' is the true contradictory—*not*, be it noted, 'not-man is.' Or take 'man is white' ; then we have 'man is not white,' and *not* 'man is not-white.' For, were this not so, inasmuch as the affirmative or negative statement is true of all subjects whatever, it would prove to be true to affirm that 'a log is a not-white man.'^a

All this may be readily granted, but what of those numerous statements that do not contain 'is' or 'is not,' some other verb taking its place ? If the views just expressed are correct, then the latter performs the same function. 'Man walks' has for contradictory, in consequence, 'man does not walk.' And to say that 'not-man walks' is wrong. For the two propositions, 'man walks,' 'man is walking,' mean just the same thing. Now, if all this is always the case, it applies to 'it may be' as well. Not 'it cannot be' but 'it may *not*-be' is, therefore, its true contradictory.

However, it certainly seems that the same thing may be and not be. Thus, for instance, whatever the statement 'man is white' could have 'man is not-white' for contradictory.

21 b

καὶ μὴ βαδίζειν καὶ μὴ τέμνεσθαι δυνατόν. λόγος
 15 δέ, ὅτι ἅπαν τὸ οὕτω δυνατόν οὐκ αἰεὶ ἐνεργεῖ,
 ὥστε ὑπάρξει αὐτῷ καὶ ἡ ἀπόφασις· δύναται γὰρ
 καὶ μὴ βαδίζειν τὸ βαδιστικόν καὶ μὴ ὁράσθαι τὸ
 ὁρατόν.

Ἄλλὰ μὴν ἀδύνατον κατὰ τοῦ αὐτοῦ ἀληθεύεσθαι
 τὰς ἀντικειμένας φάσεις· οὐκ ἄρα τοῦ δυνατόν
 εἶναι ἀπόφασίς ἐστι τὸ δυνατόν μὴ εἶναι. συμ-
 20 βαίνει γὰρ ἐκ τούτων ἢ τὸ αὐτὸ φάναι καὶ ἀπο-
 φάναι ἅμα καὶ κατὰ τοῦ αὐτοῦ, ἢ μὴ κατὰ τὸ
 εἶναι καὶ μὴ εἶναι τὰ προστιθέμενα γίνεσθαι φάσεις
 καὶ ἀποφάσεις. εἰ οὖν ἐκεῖνο ἀδύνατον, τοῦτ' ἂν
 εἴη αἰρετόν.

Ἔστιν ἄρα ἀπόφασις τοῦ δυνατόν εἶναι τὸ μὴ
 δυνατόν εἶναι. ὁ δ' αὐτὸς λόγος καὶ περὶ τοῦ
 25 ἐνδεχόμενον εἶναι· καὶ γὰρ τούτου ἀπόφασις τὸ
 μὴ ἐνδεχόμενον εἶναι. καὶ ἐπὶ τῶν ἄλλων
 δὲ ὁμοιοτρόπως, οἷον ἀναγκαίου τε καὶ ἀδυνάτου.
 γίνεται γὰρ ὥσπερ ἐπ' ἐκείνων τὸ εἶναι καὶ τὸ
 μὴ εἶναι προσθέσεις, τὰ δ' ὑποκείμενα πράγματα
 τὸ μὲν λευκὸν τὸ δ' ἄνθρωπος, οὕτως ἐνταῦθα τὸ
 μὲν εἶναι καὶ μὴ εἶναι ὡς ὑποκείμενον γίνεται, τὸ
 80 δὲ δύνασθαι καὶ τὸ ἐνδέχεσθαι προσθέσεις δι-
 ορίζουσαι, ὥσπερ ἐπ' ἐκείνων τὸ εἶναι καὶ μὴ
 εἶναι τὸ ἀληθὲς καὶ τὸ ψεῦδος, ὁμοίως αὐταὶ ἐπὶ
 τοῦ εἶναι δυνατόν καὶ εἶναι οὐ δυνατόν.

Τοῦ δὲ δυνατόν μὴ εἶναι ἀπόφασις οὐ τὸ οὐ
 δυνατόν εἶναι, ἀλλὰ τὸ οὐ δυνατόν μὴ εἶναι, καὶ
 35 τοῦ δυνατόν εἶναι οὐ τὸ δυνατόν μὴ εἶναι, ἀλλὰ
 τὸ μὴ δυνατόν εἶναι. διὸ καὶ ἀκολουθεῖν ἂν δόξειαν

* Grote has called these 'intermittent realities' (*Aristotle*, p. 128).

may walk or be cut may not walk or be cut. And the reason for this is that such things as are in this manner potential do not at all times energize.^a Both the positive and negative statements will, therefore, be true in such cases. For that which may walk or be seen may, *per contra*, not walk nor be seen.

None the less, contradictory statements can never be true of one subject. And so we conclude that 'it may be' has not, after all, 'it may *not* be' by way of its proper negation. For it follows from our previous statements that we can at one time of one subject affirm and deny the same predicate or it is not, in reality, the adding the verb 'is' or 'is not' that makes an affirmation or denial. The former position is impossible; the latter must thus be adopted.

'It cannot be,' not 'it may not be,' is, therefore, the proper negation. With 'it is contingent it should be' we deal in a similar manner, its true contradictory being 'it is not contingent it should be.' So, too, with the like propositions, 'it is necessary,' 'it is impossible.' As in the earlier instances 'is' and 'is not' have been added to the underlying things, so to speak—otherwise, the two terms, 'white' and 'man'—so in these 'it should be,' 'it should not be,' are viewed as the things underlying, to which thereupon have been added 'is possible' and 'is contingent,' additions denoting that something is possible or is not possible, just as the 'is' or the 'is not' denoted in the earlier cases that something was true or was not.

The contradictory, then, of 'it may be' is 'it cannot be,' not 'it may *not* be,' of which the contradictory, in turn, is 'it cannot not be,' not 'it cannot be.' So on these grounds it appears that 'it may be'

- 21 ^b ἀλλήλαις αἱ τοῦ δυνατόν εἶναι καὶ δυνατόν μὴ εἶναι· τὸ γὰρ αὐτὸ δυνατόν εἶναι καὶ μὴ εἶναι· οὐ γὰρ ἀντιφάσεις ἀλλήλων αἱ τοιαῦται, τὸ δυνατόν εἶναι καὶ δυνατόν μὴ εἶναι. ἀλλὰ τὸ δυνατόν
- 22 ^a εἶναι καὶ μὴ δυνατόν εἶναι οὐδέποτε ἐπὶ τοῦ αὐτοῦ ἅμα ἀληθεύονται· ἀντίκεινται γάρ. οὐδέ γε τὸ δυνατόν μὴ εἶναι καὶ οὐ δυνατόν μὴ εἶναι οὐδέποτε ἅμα ἐπὶ τοῦ αὐτοῦ ἀληθεύονται.

Ὅμοίως δὲ καὶ τοῦ ἀναγκαῖον εἶναι ἀπόφασις οὐ τὸ ἀναγκαῖον μὴ εἶναι, ἀλλὰ τὸ μὴ ἀναγκαῖον εἶναι· τοῦ δὲ ἀναγκαῖον μὴ εἶναι τὸ μὴ ἀναγκαῖον μὴ εἶναι. καὶ τοῦ ἀδύνατον εἶναι οὐ τὸ ἀδύνατον μὴ εἶναι, ἀλλὰ τὸ μὴ ἀδύνατον εἶναι· τοῦ δὲ ἀδύνατον μὴ εἶναι τὸ οὐκ ἀδύνατον μὴ εἶναι.

Καὶ καθόλου δέ, ὥσπερ εἴρηται, τὸ μὲν εἶναι
 10 καὶ μὴ εἶναι δεῖ τιθέναι ὡς τὰ ὑποκείμενα, κατά-
 φασιν δὲ καὶ ἀπόφασιν ταῦτα ποιοῦντα πρὸς τὸ
 εἶναι καὶ μὴ εἶναι συντάττειν. καὶ ταύτας οἶεσθαι
 χρή εἶναι τὰς ἀντικειμένας φάσεις, δυνατόν—οὐ
 δυνατόν, ἐνδεχόμενοι—οὐκ ἐνδεχόμενον, ἀδύνατον
 —οὐκ ἀδύνατον, ἀναγκαῖον—οὐκ ἀναγκαῖον, ἀληθές
 —οὐκ ἀληθές.

XIII. Καὶ αἱ ἀκολουθήσεις δὲ κατὰ λόγον γίνον-

ON INTERPRETATION, XII-XIII

implies 'it may *not* be,' as also the latter the former. These statements not being contradictory, the same thing may be and may *not* be. 'It may be,' however, 'it cannot be,' being contradictory statements, can never be both of them true of one subject at any one time. And the same may be said of the statements 'it cannot *not* be,' 'it may *not* be.'

Propositions concerning necessity are subject to similar rules—'it is necessary that it should be,' 'it is necessary that it should not be.' 'Not necessary that it should be' will provide the negation of the former, *not* 'necessary that it should not be.' We have, again, taking the latter, 'not necessary that it should not be.' So also with 'it is impossible that it should be' or 'should not be.' 'Not impossible that it should be' constitutes the denial of the former, not 'impossible that it should not be'; 'not impossible that it should not be' the proper denial of the latter.

Speaking generally, then, as we said, we must take as the things underlying all such propositions as these 'that it should be' and 'that it should not be' and add one or other of these, would we make affirmations or denials of those other terms that we mentioned, of 'possible,' 'contingent' and so on.

The following pairs must be reckoned as five contradictory pairs :—

It may be.	It cannot be.
It is contingent.	It is not contingent.
It is impossible.	It is not impossible.
It is necessary.	It is not necessary.
It is true.	It is not true.

XIII. From these affirmations and negations set out in the foregoing manner certain consequences logically follow.

22 a
 15 ται οὕτω τιθεμένοις· τῷ μὲν γὰρ δυνατόν εἶναι τὸ
 ἐνδέχασθαι εἶναι, καὶ τοῦτο ἐκείνῳ ἀντιστρέφει,
 καὶ τὸ μὴ ἀδύνατον εἶναι καὶ τὸ μὴ ἀναγκαῖον
 εἶναι· τῷ δὲ δυνατόν μὴ εἶναι καὶ ἐνδεχόμενον μὴ
 εἶναι τὸ μὴ ἀναγκαῖον μὴ εἶναι καὶ τὸ οὐκ ἀ-
 δύνατον μὴ εἶναι, τῷ δὲ μὴ δυνατόν εἶναι καὶ μὴ
 20 ἐνδεχόμενον εἶναι τὸ ἀναγκαῖον μὴ εἶναι καὶ τὸ
 ἀδύνατον εἶναι, τῷ δὲ μὴ δυνατόν μὴ εἶναι καὶ μὴ
 ἐνδεχόμενον μὴ εἶναι τὸ ἀναγκαῖον εἶναι καὶ τὸ
 ἀδύνατον μὴ εἶναι. θεωρείσθω δὲ ἐκ τῆς ὑπο-
 γραφῆς ὡς λέγομεν.

	δυνατόν εἶναι	οὐ δυνατόν εἶναι
25	ἐνδεχόμενον εἶναι	οὐκ ἐνδεχόμενον εἶναι
	οὐκ ἀδύνατον εἶναι	ἀδύνατον εἶναι
	οὐκ ἀναγκαῖον εἶναι	ἀναγκαῖον μὴ εἶναι
	δυνατόν μὴ εἶναι	οὐ δυνατόν μὴ εἶναι
	ἐνδεχόμενον μὴ εἶναι	οὐκ ἐνδεχόμενον μὴ εἶναι
30	οὐκ ἀδύνατον μὴ εἶναι	ἀδύνατον μὴ εἶναι
	οὐκ ἀναγκαῖον μὴ εἶναι	ἀναγκαῖον εἶναι

* This is the wrong negation. From statements that follow we see that the table should be corrected and 'it is not necessary that it should be' and 'it is not necessary that it should not be' should be transposed.

ON INTERPRETATION, XIII

Propositions	Implications
1. It may be.	{ It is contingent. It is not impossible. It is not necessary.
2. It is contingent.	{ It may be.
3. It may <i>not</i> be (it is contingent that it should not be).	{ It is not necessary that it should not be. It is not impossible that it should not be.
4. It cannot be (it is not contingent).	{ It is necessary that it should not be. It is impossible that it should be.
5. It cannot not be (it is not contingent that it should not be).	{ It is necessary that it should be. It is impossible that it should not be.

Consider these points more at length in the light of the table subjoined :—

1
It may be.
It is contingent.
It is not impossible that it should be.
It is not necessary that it should be.

3
It may not be.
It is contingent that it should not be.
It is not impossible that it should not be.
It is not necessary that it should not be.

2
It cannot be.
It is not contingent.
It is impossible that it should be.
It is necessary that it should not be.^a

4
It cannot not be.
It is not contingent that it should not be.
It is impossible that it should not be.
It is necessary that it should be.

22 a

Τὸ μὲν οὖν ἀδύνατον καὶ οὐκ ἀδύνατον τῷ ἐν-
 δεχομένῳ καὶ δυνατῷ καὶ οὐκ ἐνδεχομένῳ καὶ μὴ
 δυνατῷ ἀκολουθεῖ μὲν ἀντιφατικῶς, ἀντεστραμ-
 85 μένως δέ· τῷ μὲν γὰρ δυνατόν εἶναι ἢ ἀπόφασις
 τοῦ ἀδυνάτου ἀκολουθεῖ, τῇ δὲ ἀποφάσει ἢ κατὰ-
 φασις· τῷ γὰρ οὐ δυνατόν εἶναι τὸ ἀδύνατον εἶναι·
 κατὰφασις γὰρ τὸ ἀδύνατον εἶναι, τὸ δ' οὐκ
 ἀδύνατον εἶναι ἀπόφασις.

Τὸ δ' ἀναγκαῖον πῶς, ὁπτεόν. φανερόν δὴ ὅτι
 οὐχ οὕτως ἔχει, ἀλλ' αἱ ἐναντίαι εἰπονται· αἱ δ'
 22 b ἀντιφάσεις χωρίς. οὐ γὰρ ἐστὶν ἀπόφασις τοῦ
 ἀνάγκη μὴ εἶναι τὸ οὐκ ἀνάγκη εἶναι· ἐνδέχεται
 γὰρ ἀληθεύεσθαι ἐπὶ τοῦ αὐτοῦ ἀμφοτέρως· τὸ
 γὰρ ἀναγκαῖον μὴ εἶναι οὐκ ἀναγκαῖον εἶναι.
 αἷτιον δὲ τοῦ μὴ ἀκολουθεῖν τὸ ἀναγκαῖον ὁμοίως
 8 τοῖς ἑτέροις, ὅτι ἐναντίως τὸ ἀδύνατον τῷ ἀναγ-
 καίῳ ἀποδίδεται, τὸ αὐτὸ δυνάμενον. εἰ γὰρ
 ἀδύνατον εἶναι, ἀναγκαῖον τοῦτο οὐκ εἶναι ἀλλὰ
 μὴ εἶναι· εἰ δὲ ἀδύνατον μὴ εἶναι, τοῦτο ἀνάγκη
 εἶναι· ὥστε εἰ ἐκείνα ὁμοίως τῷ δυνατῷ καὶ μὴ,
 ταῦτα ἐξ ἐναντίας, ἐπεὶ οὐ σημαίνει γε ταῦτόν τό
 10 τε ἀναγκαῖον καὶ τὸ ἀδύνατον, ἀλλ' ὥσπερ εἴρηται,
 ἀντεστραμμένως.

Now, 'impossible that it should be,' 'not impossible that it should be' are implied in 'may be,' 'is contingent,' and 'cannot be,' 'is not contingent'—contradictorily but with inversion. For 'may be' implies 'not impossible' (denial, that is, of 'impossible'); 'impossible,' the positive, follows upon the denial of 'may be' or, that is to say, upon 'cannot be.'

Now let us see how things stand with propositions predicating necessity. Clearly the case here is different, and contrary statements will follow upon contradictory statements, which latter belong, in addition, to sequences which are distinct. For 'not necessary that it should be' cannot form the denial or negation of 'necessary that it should not be.' For both of these predicates well may hold good or be true of one subject, as what of necessity is not need not of necessity be. Now, what is the reason why all propositions predicating necessity do not in the same manner follow as the others with which we are dealing? The answer will be found in the fact that when used with a contrary subject, to predicate impossibility amounts to affirming necessity. Supposing, I mean, it impossible for something or other to be, it is necessary, not that it should be, but that it, *per contra*, should not be. Supposing, again, it impossible that something or other should not be, it must of necessity be. So, if those propositions affirming the impossible or the reverse will be found without change of their subject to follow from those predicating possibility or non-possibility, those predicating necessity will follow with the contrary subject. 'It is necessary,' 'it is impossible' are not of identical meaning and yet are connected inversely—a point upon which we have touched.

22 b

Ἡ ἀδύνατον οὕτως κεῖσθαι τὰς τοῦ ἀναγκαίου ἀντιφάσεις; τὸ μὲν γὰρ ἀναγκαῖον εἶναι δυνατόν εἶναι· εἰ γὰρ μή, ἡ ἀπόφασις ἀκολουθήσει· ἀνάγκη γὰρ ἢ φάναι ἢ ἀποφάναι· ὥστ' εἰ μὴ δυνατόν εἶναι, ἀδύνατον εἶναι· ἀδύνατον ἄρα εἶναι τὸ ἀναγκαῖον εἶναι, ὅπερ ἄτοπον. ἀλλὰ μὴν τῷ γε
 15 δυνατόν εἶναι τὸ οὐκ ἀδύνατον εἶναι ἀκολουθεῖ, τούτῳ δὲ τὸ μὴ ἀναγκαῖον εἶναι· ὥστε συμβαίνει τὸ ἀναγκαῖον εἶναι μὴ ἀναγκαῖον εἶναι, ὅπερ ἄτοπον. ἀλλὰ μὴν οὐδὲ τὸ ἀναγκαῖον εἶναι ἀκολουθεῖ τῷ δυνατόν εἶναι, οὐδὲ τὸ ἀναγκαῖον μὴ εἶναι· τῷ μὲν γὰρ ἄμφω ἐνδέχεται συμβαίνειν,
 20 τούτων δὲ ὁποῖον ἂν ἀληθὲς ᾖ, οὐκέτι ἔσται ἐκεῖνα ἀληθὲς. ἅμα γὰρ δυνατόν εἶναι καὶ μὴ εἶναι· εἰ δ' ἀνάγκη εἶναι ἢ μὴ εἶναι, οὐκ ἔσται δυνατόν ἄμφω. λείπεται τοίνυν τὸ οὐκ ἀναγκαῖον μὴ εἶναι ἀκολουθεῖν τῷ δυνατόν εἶναι. τοῦτο γὰρ ἀληθὲς καὶ κατὰ τοῦ ἀναγκαῖον εἶναι. καὶ γὰρ αὕτη γίνεται ἀντίφασις τῇ ἐπομένῃ τῷ
 25 οὐκ δυνατόν εἶναι· ἐκείνῳ γὰρ ἀκολουθεῖ τὸ ἀδύνατον εἶναι καὶ ἀναγκαῖον μὴ εἶναι, οὐ ἢ ἀπόφασις τὸ οὐκ ἀναγκαῖον μὴ εἶναι. ἀκολουθοῦσί τε ἄρα καὶ αὗται αἱ ἀντιφάσεις κατὰ τὸν εἰρημένον τρόπον, καὶ οὐδὲν ἀδύνατον συμβαίνει τιθεμένων οὕτως.

Ἀπορήσειε δ' ἂν τις εἰ τῷ ἀναγκαῖον εἶναι τὸ

Or is it the fact that one cannot arrange in the foregoing manner contradictories predicating necessity? For that which must be also may be. For if not, the negative follows, since one or the other *must* follow. And so, if a thing is not possible, then must it needs be impossible. Hence we pronounce it impossible for that which must needs be to be. But that statement, of course, is absurd. Upon 'may be,' however, 'not impossible' follows in logical sequence, 'not necessary' upon 'not impossible,' and things that must needs be need not be—which statement, again, is absurd. 'It is necessary,' again, 'that it should be' cannot be inferred from 'it may be,' nor yet can the negative statement, 'it is necessary that it should not be.' I mean that 'it may be' implies a bilateral potentiality. Should one of the two propositions just mentioned, however, be true, there will then not be both the alternatives. The thing that may be yet may not be. But if we suppose for the moment it either must be or must not be, we rule one alternative out, and 'no need is there that it should not be' (which equally holds of what must be) must follow, therefore, from 'it may be.' We note, too, that this proposition negates that which follows on 'it cannot be,' since 'it is impossible' follows in logical sequence 'it cannot be,' just as there follows, in turn, 'it is necessary that it should not be,' and this proposition the one that we mentioned itself contradicts. So we see that in this case as well contradictories follow contradictories after the manner we mentioned, and, being arranged in that manner, they lead to no logical absurdities.

One may at this point raise the question, whether upon 'it is necessary' 'it may be' will logically

22 b
 80 δυνατόν εἶναι ἔπεται. εἴ τε γὰρ μὴ ἔπεται, ἡ
 ἀντίφασις ἀκολουθήσει, τὸ μὴ δυνατόν εἶναι· καὶ
 εἴ τις ταύτην μὴ φήσειεν εἶναι ἀντίφασιν, ἀνάγκη
 λέγειν τὸ δυνατόν μὴ εἶναι· ἅπερ ἄμφω ψευδῇ
 κατὰ τοῦ ἀναγκαῖον εἶναι. ἀλλὰ μὴν πάλιν τὸ
 αὐτὸ εἶναι δοκεῖ δυνατόν τέμνεσθαι καὶ μὴ τέμνε-
 85 σθαι καὶ εἶναι καὶ μὴ εἶναι, ὥστε ἔσται τὸ ἀναγ-
 καῖον εἶναι ἐνδεχόμενον μὴ εἶναι· τοῦτο δὲ ψεῦδος.
 φανερόν δὴ ὅτι οὐ πᾶν τὸ δυνατόν ἢ εἶναι ἢ βαδί-
 ζειν καὶ τὰ ἀντικείμενα δύναται, ἀλλ' ἔστιν ἐφ'
 ὧν οὐκ ἀληθές, πρῶτον μὲν ἐπὶ τῶν μὴ κατὰ
 λόγον δυνατῶν, οἷον τὸ πῦρ θερμαιντικὸν καὶ ἔχει
 23 a δυνάμιν ἄλογον. αἱ μὲν οὖν μετὰ λόγου δυνάμεις
 αἱ αὐταὶ πλειόνων καὶ τῶν ἐναντίων, αἱ δ' ἄλογοι
 οὐ πᾶσαι, ἀλλ' ὥσπερ εἴρηται, τὸ πῦρ οὐ δυνατόν
 θερμαίνειν καὶ μή, οὐδ' ὅσα ἄλλα ἐνεργεῖ αἰεί.
 ἔνια μέντοι δύναται καὶ τῶν κατὰ τὰς ἀλόγους
 δυνάμεις ἅμα τὰ ἀντικείμενα δέξασθαι. ἀλλὰ
 5 τοῦτο μὲν τούτου χάριν εἴρηται, ὅτι οὐ πᾶσα
 δύναμις τῶν ἀντικειμένων, οὐδ' ὅσαι λέγονται
 κατὰ τὸ αὐτὸ εἶδος.

Ἔνια δὲ δυνάμεις ὁμώνυμοί εἰσιν. τὸ γὰρ
 δυνατόν οὐχ ἀπλῶς λέγεται, ἀλλὰ τὸ μὲν ὅτι ἀλη-
 θές ὡς ἐνεργεία ὄν, οἷον δυνατόν βαδίζειν ὅτι
 10 βαδίζει, καὶ ὅλως δυνατόν εἶναι ὅτι ἤδη ἔστι κατ'
 ἐνεργείαν ὃ λέγεται εἶναι δυνατόν, τὸ δὲ ὅτι ἐνε-
 γήσειεν ἂν, οἷον δυνατόν εἶναι βαδίζειν ὅτι βαδί-
 σειεν ἂν. καὶ αὕτη μὲν ἐπὶ τοῖς κινητοῖς ἐστὶ

follow. If not, must the contradictory, 'it cannot be,' logically follow or, supposing you say that this statement is not the correct contradictory, 'it may not be' logically follows. But both propositions are false as applied to what is of necessity. It seems the accepted opinion that things that may be or be cut may, *per contra*, not be or be cut. And we should in that case be concluding that that which must be may not be, which, it goes without saying, is false. It is clear that not everything capable of being or walking possesses the opposite potentiality. Cases there are to the contrary. First, there are those things which have a non-rational potentiality. Among such, for instance, is fire, which is capable of giving out heat—a non-rational potentiality. Rational potentialities issue in more than one way or in contrary results or directions. Not so all irrational ones. That is, fire, to repeat what we said, cannot both give and not give out heat, nor can anything else always actual have any such potentiality. Some irrational potentialities, however, allow of such issues. So much, then, by way of explaining that, even where 'potentiality' is quite unambiguously used, not every potentiality admits of such opposite issues.

But sometimes the term is ambiguous. 'Possible' itself is ambiguous. It is used, on the one hand, of facts and of things that are actualized; it is 'possible' for someone to walk, inasmuch as he actually walks, and in general we call a thing 'possible,' since it is now realized. On the other hand, 'possible' is used of a thing that *might be* realized; it is 'possible' for someone to walk, since in certain conditions he would. It is only to that which can move that this

23^a μόνοις ἢ δύνამις, ἐκεῖνη δὲ καὶ ἐπὶ τοῖς ἀκινήτοις.
 ἄμφω δὲ ἀληθὲς εἶπεν τὸ μὴ ἀδύνατον εἶναι βαδί-
 ζειν ἢ εἶναι, καὶ τὸ βαδίζον ἤδη καὶ ἐνεργοῦν καὶ
 15 τὸ βαδιστικόν. τὸ μὲν οὖν οὕτω δυνατόν οὐκ
 ἀληθὲς κατὰ τοῦ ἀναγκαίου ἀπλῶς εἶπεν, θάτερον
 δὲ ἀληθὲς. ὥστε ἐπὶ τῷ ἐν μέρει τὸ καθόλου
 ἔπεται, τῷ ἐξ ἀνάγκης ὅτι ἔπεται τὸ δύνασθαι
 εἶναι, οὐ μέντοι πᾶν. καὶ ἔστι δὴ ἀρχὴ ἴσως τὸ
 ἀναγκαῖον καὶ μὴ ἀναγκαῖον πάντων ἢ εἶναι ἢ
 20 μὴ εἶναι, καὶ τᾶλλα ὡς τούτοις ἀκολουθοῦντα
 ἐπισκοπεῖν δεῖ.

Φανερόν δὴ ἐκ τῶν εἰρημένων ὅτι τὸ ἐξ ἀνάγκης
 ὄν κατ' ἐνέργειάν ἐστιν, ὥστε εἰ πρότερα τὰ αἰδία,
 καὶ ἡ ἐνέργεια δυνάμεως προτέρα. καὶ τὰ μὲν
 ἄνευ δυνάμεως ἐνέργειαί εἰσιν, οἷον αἱ πρῶται
 25 οὐσίαι, τὰ δὲ μετὰ δυνάμεως, ἃ τῇ μὲν φύσει
 πρότερα τῷ δὲ χρόνῳ ὕστερα, τὰ δὲ οὐδέποτε
 ἐνέργειαί εἰσιν ἀλλὰ δυνάμεις μόνον.

XIV. Πότερον δὲ ἐναντία ἐστὶν ἡ κατάφασις
 τῇ ἀποφάσει ἢ ἡ κατάφασις τῇ καταφάσει, καὶ
 80 ὁ λόγος τῷ λόγῳ ὁ λέγων ὅτι πᾶς ἄνθρωπος
 δίκαιος τῷ οὐδεὶς ἄνθρωπος δίκαιος, ἢ τὸ πᾶς

* God and the intelligences moving the celestial or heavenly bodies. The argument implies that the necessary is also eternal. 'The main proof,' says Dr. Ross, 'of the priority of actuality is the following:—What is external is prior in nature to what is perishable; and nothing is eternal by virtue of potentiality. For that which has the potentiality of being has also the potentiality of not-being, while the eternal is that which from its very nature cannot fail to be. In a sense, therefore, all the primordial entities in the universe are free from potentiality. God is in the fullest sense actual, since He is always what He is at any time, and has no element of unrealized potentiality' (*Aristotle*, p. 177).

ON INTERPRETATION, XIII-XIV

kind of capacity belongs, while the former may also belong to such things as have no power of motion. Both of that which is walking and actual and of that which is capable of walking but does not now actually walk, it holds good that it is not impossible that it should walk (or should be). Now, this latter potentiality we cannot affirm of the necessary in its unqualified sense ; but the other we can so affirm. In conclusion, then, as the universal must follow upon the particular, so will the possible follow on that which exists of necessity, although not in all of its senses. Of being, not-being, indeed, may necessity, I think, and its absence be properly called the first principles, so that all else must be viewed as but following or consequent on them.

It is evident from the foregoing that the necessary is also the actual. And the actual is prior to the potential, inasmuch as the eternal is prior. There are, first of all, those actualities entirely without possibility, such as the primary substances.^a Then there is that class of things which are actual and also potential : actuality is prior to possibility with these in the order of nature, although it is not prior in time.^b There are finally those things also that remain but the barest possibilities and never become actualities.^c

XIV. Here arises a doubt as to whether an affirmative statement is contrary to a negative statement or contrary to a second affirmation. Has the proposition ' every man is just ' for its contrary ' no man is

^b Generated and perishable substances in the sublunary world.

^c Such as the largest number, the least magnitude and so on. These are never realized, though conceivable.

23 a

ἄνθρωπος δίκαιος τῷ πᾶς ἄνθρωπος ἄδικος, οἷον
 ἔστι Καλλίας δίκαιος—οὐκ ἔστι Καλλίας δίκαιος—
 Καλλίας ἄδικός ἐστι· ποτέρα δὴ ἐναντία τούτων;
 εἰ γὰρ τὰ μὲν ἐν τῇ φωνῇ ἀκολουθεῖ τοῖς ἐν τῇ
 διανοίᾳ, ἐκεῖ δὲ ἐναντία δόξα ἢ τοῦ ἐναντίου, οἷον
 ὅτι πᾶς ἄνθρωπος δίκαιος τῇ πᾶς ἄνθρωπος ἄδικος,

35

καὶ ἐπὶ τῶν ἐν τῇ φωνῇ καταφάσεων ἀνάγκη
 ὁμοίως ἔχειν. εἰ δὲ μὴ ἐκεῖ ἢ τοῦ ἐναντίου
 δόξα ἐναντία ἐστίν, οὐδὲ ἢ κατάφασις τῇ κατα-
 φάσει ἔσται ἐναντία, ἀλλ' ἢ εἰρημένη ἀπόφασις.
 ὥστε σκεπτέον ποία δόξα ἀληθῆς ψευδεῖ δόξη
 ἐναντία, πότερον ἢ τῆς ἀποφάσεως ἢ ἢ τὸ ἐναν-

40

τίον εἶναι δοξάζουσα. λέγω δὲ ὧδε. ἔστι τις
 23 b δόξα ἀληθῆς τοῦ ἀγαθοῦ ὅτι ἀγαθόν, ἄλλη δὲ
 ὅτι οὐκ ἀγαθὸν ψευδής, ἑτέρα δὲ ὅτι κακόν.
 ποτέρα δὴ τούτων ἐναντία τῇ ἀληθεί; καὶ εἰ ἔστι
 μία, καθ' ὅποτέραν ἢ ἐναντία;

Τὸ μὲν δὴ τούτῳ οἶεσθαι τὰς ἐναντίας δόξας
 ὠρίσθαι, τῷ τῶν ἐναντίων εἶναι, ψεῦδος· τοῦ γὰρ
 5 ἀγαθοῦ ὅτι ἀγαθὸν καὶ τοῦ κακοῦ ὅτι κακὸν ἢ
 αὐτὴ ἴσως καὶ ἀληθῆς ἔσται, εἴτε πλείους εἴτε μία
 ἐστίν. ἐναντία δὲ ταῦτα. ἀλλ' οὐ τῷ ἐναντίων
 εἶναι ἐναντία, ἀλλὰ μᾶλλον τῷ ἐναντίως.

Εἰ δὴ ἔστι μὲν τοῦ ἀγαθοῦ ὅτι ἐστὶν ἀγαθὸν

* Grote observes upon this that some of Aristotle's observations 'respecting the place and functions of the negative particle (οὐ), must be understood with reference to the variable order of words in a Greek or Latin sentence; for instance, the distinction between *Kallias non est iustus* and *Kallias est non iustus* does not suggest itself to one speaking English or French' (*Aristotle*, p. 137). But possibly this particular chapter is not by Aristotle himself.

just'? Or is 'every man is unjust' the contrary? 'Callias is just,' 'is not just,' 'is unjust' illustrate what I mean.^a Which of these propositions are contraries? Supposing that the verbal proposition corresponds with the intellectual judgement, and, further, that that judgement is contrary to a judgement asserting the contrary, as judging that every man is just is to judging every man is unjust, then the same thing assuredly holds of our verbal propositions as well. On the other hand, if we suppose that the judgement asserting the contrary is not, in the mind of the speaker, the contrary one to another, no longer will one affirmation be contrary unto another. The negation will be the true contrary. Which of the true judgements, then, is the contrary one to the false? Is it that which denies the false judgement? Or that which pronounces the contrary? Take, for example, three judgements concerning a thing that is good—a true judgement or that 'it is good,' a false judgement or 'it is not good,' and a third, quite distinct, 'it is bad.' Of the last two which constitutes really the contrary one to the true? Or supposing them one and the same, then which verbal expression is the contrary?

To fancy that contrary judgements are those that have contrary subjects is to take an erroneous view. For the judgement that a good thing is good and the judgement that a bad thing is bad may be possibly one and the same; one or more, they are both of them true. Yet the subjects are contrary here. But what constitutes judgements as contrary is having two contrary senses, not having two contrary subjects.

Suppose that we have two opinions regarding a thing that is good, one opining that that thing is

- ²³ ^b δόξα, ἄλλη δ' ὅτι οὐκ ἀγαθόν, ἔστι δὲ ἄλλο τι ὃ οὐχ ὑπάρχει οὐδ' οἷόν τε ὑπάρξαι, τῶν μὲν δὴ
¹⁰ ἄλλων οὐδεμίαν θετέον, οὔτε ὅσαι ὑπάρχειν τὸ μὴ ὑπάρχον δοξάζουσιν οὔθ' ὅσαι μὴ ὑπάρχειν τὸ ὑπάρχον (ἄπειροι γὰρ ἀμφότεραι, καὶ ὅσαι ὑπάρχειν δοξάζουσι τὸ μὴ ὑπάρχον καὶ ὅσαι μὴ ὑπάρχειν τὸ ὑπάρχον), ἀλλ' ἐν ὅσαις ἐστὶν ἡ ἀπάτη. αὗται δὲ εἰσιν ἐξ ὧν αἱ γενέσεις. ἐκ τῶν ἀντικειμένων δὲ αἱ γενέσεις, ὥστε καὶ αἱ ἀπάται.
- ¹⁵ Εἰ οὖν τὸ ἀγαθὸν καὶ ἀγαθὸν καὶ οὐ κακὸν ἐστὶ, καὶ τὸ μὲν καθ' ἑαυτὸ τὸ δι' κατὰ συμβεβηκός (συμβέβηκε γὰρ αὐτῷ οὐ κακῷ εἶναι), μᾶλλον δὲ ἐκάστου ἀληθῆς ἢ καθ' ἑαυτό, καὶ ψευδῆς, εἶπερ καὶ ἀληθῆς. ἡ μὲν οὖν ὅτι οὐκ ἀγαθὸν τὸ ἀγαθὸν τοῦ καθ' ἑαυτὸ ὑπάρχοιτος ψευδῆς, ἡ δὲ τοῦ ὅτι
²⁰ κακὸν τοῦ κατὰ συμβεβηκός. ὥστε μᾶλλον ἂν εἴη ψευδῆς τοῦ ἀγαθοῦ ἢ τῆς ἀποφάσεως ἢ ἡ τοῦ ἐναντίου δόξα. διέψευσται δὲ μάλιστα περὶ ἑκαστον ὃ τὴν ἐναντίαν ἔχων δόξαν· τὰ γὰρ ἐναντία τῶν πλείστον διαφερόντων περὶ τὸ αὐτό. εἰ οὖν ἐναντία μὲν τούτων ἢ ἑτέρα, ἐναντιωτέρα δὲ ἢ
²⁵ τῆς ἀντιφάσεως, δῆλον ὅτι αὕτη ἂν εἴη ἐναντία. ἡ δὲ τοῦ ὅτι κακὸν τὸ ἀγαθὸν συμπεπλεγμένη

* In order to make this point clear, Aristotle, it seems, should have added 'whereas there can be but one contrary.'

good and the other one that it is not, and suppose there exist other qualities such as are neither inherent nor could be inherent in good, no opinion, notwithstanding, must be taken for the contrary one to the true that opines that some quality inheres, though it does not inhere, in the good or opines that it does not inhere, though it does so inhere, in the good, inasmuch as no limit of range is imposed on these types of opinion.^a We shall rather call contrary to the true ones those judgements, in which there is error. And these have to do with generation. Generation means passing or transition from one of two extremes to the other: hence error is such a transition.

What is good, then, is good and not bad. The one quality belongs to it essentially, the other by accident only. For by accident is it not bad. But supposing that judgement the truest that deals with a thing's actual essence, that false one is really most false, that in like manner deals with its essence. A false judgement, dealing with essence, is 'that which is good is not good.' 'It is bad,' though a false judgement also, concerns what is accidental only. So the judgement denying its goodness is falser than that predicating some other and contrary quality. And then most completely deceived is the man who on this or that point entertains an opinion or judgement which is contrary to that which is true. For contraries belong to those things that within the same class differ most. Supposing, then, that one of two judgements is contrary to that which is true but that that which is contradictory is even more contrary still, then the latter must be the real contrary. To judge that a good thing is bad is, moreover, a com-

23 b ἐστί· καὶ γὰρ ὅτι οὐκ ἀγαθὸν ἀνάγκη ἴσως ὑπο-
λαμβάνειν τὸν αὐτόν.

Ἔτι δέ, εἰ καὶ ἐπὶ τῶν ἄλλων ὁμοίως δεῖ ἔχειν,
καὶ ταύτῃ ἂν δόξειε καλῶς εἰρῆσθαι· ἡ γὰρ παν-
ταχοῦ τὸ τῆς ἀντιφάσεως ἡ οὐδαμοῦ. ὅσοις δέ
30 μὴ ἐστὶν ἐναντία, περὶ τούτων ἔστι μὲν ψευδὴς ἡ
τῇ ἀληθεῖ ἀντικειμένη, οἷον ὁ τὸν ἄνθρωπον οὐκ
ἄνθρωπον οἰόμενος διέψευσται. εἰ οὖν αὗται ἐναν-
τίαι, καὶ αἱ ἄλλαι αἱ τῆς ἀντιφάσεως.

Ἔτι ὁμοίως ἔχει ἡ τοῦ ἀγαθοῦ ὅτι ἀγαθὸν καὶ
ἡ τοῦ μὴ ἀγαθοῦ ὅτι οὐκ ἀγαθόν, καὶ πρὸς ταύταις
ἡ τοῦ ἀγαθοῦ ὅτι οὐκ ἀγαθόν καὶ ἡ τοῦ μὴ ἀγαθοῦ
35 ὅτι ἀγαθόν. τῇ οὖν τοῦ μὴ ἀγαθοῦ ὅτι οὐκ ἀγαθὸν
ἀληθεῖ οὔση δόξῃ τίς ἂν εἴη ἡ ἐναντία; οὐ γὰρ
δὴ ἡ λέγουσα ὅτι κακόν· ἅμα γὰρ ἂν ποτε εἴη
ἀληθὴς, οὐδέποτε δὲ ἀληθὴς ἀληθεῖ ἐναντία· ἔστι
γάρ τι μὴ ἀγαθὸν κακόν, ὥστε ἐνδέχεται ἅμα
ἀληθεῖς εἶναι. οὐδ' αὖ ἡ ὅτι οὐ κακόν· ἀληθὴς
40 γὰρ καὶ αὕτη. ἅμα γὰρ καὶ ταῦτα ἂν εἴη. λείπε-
ται οὖν τῇ τοῦ μὴ ἀγαθοῦ ὅτι οὐκ ἀγαθὸν ἐναντία
24 a ἡ τοῦ μὴ ἀγαθοῦ ὅτι ἀγαθόν· ψευδὴς γὰρ αὕτη.
ὥστε καὶ ἡ τοῦ ἀγαθοῦ ὅτι οὐκ ἀγαθὸν τῇ τοῦ
ἀγαθοῦ ὅτι ἀγαθόν.

Φανερόν δὲ ὅτι οὐδὲν διοίσει οὐδ' ἂν καθόλου
5 τιθῶμεν τὴν κατάφασιν· ἡ γὰρ καθόλου ἀπόφασις
ἐναντία ἔσται, οἷον τῇ δόξῃ τῇ δοξαζούσῃ ὅτι πᾶν
ὁ ἂν ᾗ ἀγαθὸν ἀγαθόν ἐστὶν ἡ ὅτι οὐδὲν τῶν ἀγαθῶν

posite judgement. For the man who thus judges, I think, must as certainly judge it not good.

Then again, the contradictory judgement is the contrary always or never. And if this holds good in all others, so must it in this case as well, and the view that we took was correct. In the case of things having no contraries we hold that that judgement is false which denies what the true one asserts. Thus a man is, for instance, deceived who supposes a man not a man. If the contraries here are the negatives, so, we conclude, are they always.

Then, that what is not good is not good is a similar or parallel judgement to one that a good thing is good, and that that which is good is not good is a parallel judgement to judging that that which is not good is good. What is contrary, then, to the true one that what is not good is not good? Not, at any rate, that it is bad; that might well at the same time be true, and true judgements can never be contrary. Some things that are not good are bad, so that both may together be true. Nor is judging it not bad the contrary, seeing that, too, may be true, since both attributes might be compresent. And so in the case of the judgement that what is not good is not good we are driven at last to conclude that the contrary is that it is good. For that judgement, of course, is a false one. Again, in a similar manner of the judgement that a good thing is good the true contrary is that it is not.

To make the affirmation universal will evidently not alter matters. The universal negative judgement will then be the obvious contrary. Suppose, for example, a man judges everything good to be good: then the contrary of this is his judging that nothing

- 24 ^a ἀγαθόν. ἡ γὰρ τοῦ ἀγαθοῦ ὅτι ἀγαθόν, εἰ καθόλου
 τὸ ἀγαθόν, ἡ αὐτὴ ἐστὶ τῇ ὅτι ὁ ἂν ἢ ἀγαθὸν
 δοξαζούσῃ ὅτι ἀγαθόν· τοῦτο δὲ οὐδὲν διαφέρει
 τοῦ ὅτι πᾶν ὁ ἂν ἢ ἀγαθὸν ἀγαθόν ἐστίν. ὁμοίως
 24 ^b δὲ καὶ ἐπὶ τοῦ μὴ ἀγαθοῦ.

Ὡστε εἴπερ ἐπὶ δόξης οὕτως ἔχει, εἰσὶ δὲ αἱ ἐν
 τῇ φωνῇ καταφάσεις καὶ ἀποφάσεις σύμβολα τῶν
 ἐν τῇ ψυχῇ, δῆλον ὅτι καὶ καταφάσει ἐναντία
 μὲν ἀπόφασις ἢ περὶ τοῦ αὐτοῦ καθόλου, οἷον τῇ
 ὅτι πᾶν ἀγαθὸν ἀγαθόν ἢ ὅτι πᾶς ἄνθρωπος
 5 ἀγαθὸς ἢ ὅτι οὐδὲν ἢ οὐδεὶς, ἀντιφατικῶς δὲ ὅτι
 ἢ οὐ πᾶν ἢ οὐ πᾶς. φανερόν δὲ ὅτι καὶ ἀληθῇ
 ἀληθεῖ οὐκ ἐνδέχεται ἐναντίαν εἶναι οὔτε δόξαν
 οὔτε ἀντίφασιν.¹ ἐναντίαι μὲν γὰρ αἱ περὶ τὰ
 ἀντικείμενα, περὶ ταῦτα δὲ ἐνδέχεται ἀληθεύειν
 τὸν αὐτόν· ἅμα δὲ οὐκ ἐνδέχεται τὰ ἐναντία ὑπ-
 ἄρχειν τῷ αὐτῷ.

¹ ἀπ' ὁφασιν B.

of that kind is good. For the judging what is good to be good, if the subject be taken universally, amounts to a judgement pronouncing whatever is good to be good, and the latter in turn to a judgement pronouncing good everything good. And the same is the case with the not good.

If this is the case with our judgements and verbal affirmations and denials are symbols of those mental judgements, it is clear the universal denial, when the subject is one and the same, is the positive statement's true contrary. For instance, propositions affirming every good, every man to be good have for contraries propositions affirming no man, nothing good to be good. Contradictories, however, have for subjects 'not every man,' 'not every good.' It is manifest, too, that true judgements and true propositions can never be contrary one to another. While two propositions that are true can together be truly asserted, two contrary propositions must predicate contrary qualities, and these in the selfsame subject can never together inhere.