### 5. THALES [THAL.]

Thales' activity is situated at Miletus between the second half of the seventh century and the first decades of the sixth century BC. He is included in the canonical list of the seven "Sages," which goes back to an early date (P1b, cf. R2-R4). Histories of philosophy often present him as "the first philosopher," largely because of the way in which Aristotle introduces him in the *Metaphysics*, as the first to have practiced a philosophy of "nature" (R9). But the most ancient testimonia, notably those of Aristophanes and Herodotus, rather suggest a multifaceted figure engaged above all in politics and (especially hydraulic) engineering. It is most likely that he left no writings behind, as is suggested by the fact that already Aristotle seems to have no direct knowledge of his ideas. A large number of mathematical and scientific discoveries are attributed to him by later authors, but it is usually difficult or impossible to say whether, and if so to what extent, they really do go back to him; in any case, we have put all these reports into the section on Thales' reception (R13–R31). In general, the distinction, maintained here as in the other chapters, between doctrine and reception is more hypothetical in the case of Thales than in most other ones.

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## THALES [11 DK]

P

### Chronology (P1)

P1 (< A1) Diog. Laert.

**a** 1.37–38

φησὶ δ' ἀπολλόδωρος ἐν τοῖς Χρονικοῖς [FGrHist 244 F28] γεγενῆσθαι αὐτὸν κατὰ τὸ πρῶτον ἔτος τῆς τριακοστῆς πέμπτης¹ 'Ολυμπιάδος. ἐτελεύτησε δ' ἐτῶν ἑβδομήκοντα ὀκτώ, ἤ, ὡς Σωσικράτης φησίν [Frag. 1 Giannattasio Andria], ἐνενήκοντα· τελευτῆσαι γὰρ ἐπὶ τῆς πεντηκοστῆς ὀγδόης 'Ολυμπιάδος, γεγονότα κατὰ Κροῖσον [. . .].

 $^{1}$ π $\epsilon$ μπτης]  $\epsilon$ ν $\alpha$ της prop. Diels

### **b** 1.22

καὶ πρῶτος σοφὸς ἀνομάσθη ἄρχοντος ᾿Αθήνησι Δαμασίου, καθ' ὃν καὶ οἱ ἐπτὰ σοφοὶ ἐκλήθησαν, ὥς φησι Δημήτριος ὁ Φαληρεὺς ἐν τῆ τῶν ᾿Αρχόντων ἀναγραφῆ [Frag. 149 Wehrli].

P

### Chronology (P1)

**P1** (< A1) Diogenes Laertius

a

Apollodorus in his *Chronicles* says that he was born in the first year of the 35th Olympiad [= 640/39].<sup>1</sup> He died at the age of seventy-eight; or, as Sosicrates says, at ninety; for he died during the 58th Olympiad [= 548/44], having lived at the time of Croesus [...].<sup>2</sup>

- <sup>1</sup> Diels suggested correcting "35th" to "39th" (= 624/23).
- <sup>2</sup> A competing ancient chronology (A2, A8 DK) dated Thales to the mid-eighth century BC.

### b

And he was first called a "sage" when Damasius was archon in Athens [= 582/81]; it was during this time that the Seven Sages were named, as Demetrius of Phalerum says in his *Catalog of the Archons* [cf. **R2–R4**].

### Origins and Family (P2)

**P2** (< A1) Diog. Laert. 1.22

ἢν τοίνυν ὁ Θαλῆς, ὡς μὲν Ἡρόδοτος [cf. 1.170] καὶ Δοῦρις [FGrHist 76 F74] καὶ Δημόκριτός [cf. ATOM. P23-P26] φασι, πατρὸς μὲν Ἐξαμύου, μητρὸς δὲ Κλεοβουλίνης, ἐκ τῶν Θηλιδῶν,¹ οἴ εἰσι Φοίνικες, εὐγενέστατοι τῶν ἀπὸ Κάδμου καὶ Ἁγήνορος. [. . .] ἐπολιτογραφήθη δὲ ἐν Μιλήτῳ, ὅτε ἢλθε σὺν Νείλεῳ² ἐκπεσόντι Φοινίκης ὡς δ' οἱ πλείους φασίν, ἰθαγενὴς Μιλήσιος ἢν καὶ γένους λαμπροῦ.

1 Nηλειδων Bywater 2 varia mss., corr. Diels

### Alleged Education in Egypt (P3–P5)

**P3** (< A1) Diog. Laert. 1.27

οὐδεὶς δὲ αὐτοῦ καθηγήσατο, πλην ὅτι εἰς Αἴγυπτον ἐλθὼν τοῖς ἱερεῦσι συνδιέτριψεν.

**P4** (A11) Aët. 1.3.1 (Ps.-Plut.)  $[\pi \epsilon \rho \hat{\iota} \ d\rho \chi \hat{\omega} \nu \ \tau \hat{\iota} \ \epsilon \hat{\iota} \sigma \iota \nu]$ φιλοσοφήσας  $\hat{\epsilon} \nu$  Αἰγύπτω ἦλθεν εἰς Μίλητον πρεσβύτερος.

### **P5** (A11) Iambl. *VP* 12

[...] προτρέψατο εἰς Αἴγυπτον διαπλεῦσαι καὶ τοῖς ἐν Μέμφιδι καὶ Διοσπόλει μάλιστα συμβαλεῖν ἱερεῦσι·

### Origins and Family (P2)

### **P2** (< A1) Diogenes Laertius

Thales, as Herodotus, Duris, and Democritus [cf. R1] report, had as father Examuas and as mother Cleobuline, of the family of the Thelides, who are Phoenicians, the most noble of the descendants of Cadmus and Agenor. [...] He became a citizen of Miletus when he went there with Neileus, who had been exiled from Phoenicia. But according to what most authors report, he was of genuine Milesian lineage and belonged to an illustrious family.

### Alleged Education in Egypt (P3–P5)

### P3 (< A1) Diogenes Laertius

No one showed him the way, except that he went to Egypt and spent time with the priests.

### P4 (A11) Aëtius

After he had practiced philosophy in Egypt, he came to Miletus as an old man.

### P5 (A11) Iamblichus, Life of Pythagoras

[...] he exhorted him [i.e. Pythagoras] to sail to Egypt and to spend time above all with the priests of Memphis and

εται: δ σοφος παρά τοις πογγοίς νομίζεται: παρά γάρ έκείνων και έαυτον έφωδιάσθαι ταθτα, δι

Disciple of Pherecydes, Like Pythagoras?

See PYTH, P13

**P6** (> A6) Hdt. 1.75

The Engineer (P6)

στα δ ποταμός, άμφοτέρη διαβατός έγένετο. τα άρχαια έσβάλλοι, ώστε, έπείτε και έσχίσθη τάχιέθρων, και αθτις, παραμειβόμενος το στρατόπεδον, ές κατα την διώρυχα έκτραπόμενος έκ των άρχαίων δετὸ στρατόπεδον ίδρυμένον κατά νώτου λάβοι, ταύτη φρυχα βαθέαν ορύσσειν άγοντα μηνοειδέα, όκως άν σαι δε διδε. ἄνωθεν τοῦ στρατοπέδου άρξάμενον δι-Χειρός βέοντα τού στρατού και έκ δεξιής βέειν, ποιήεξησει στρατοπ νότ φτύε ποταμον φδέποταστο γεφύρας ταύτας), λέγεται παρεόντα τον Θαλήν έν τβ στρατός (ού γάρ δη είναι κω τούτον τον χρόνον τάς γάρ Κροίσου όκως οί διαβήσεται τον ποταμον ό λήνων, Θαλής οί ὁ Μιλήσιος διεβίβασε. ἀπορέοντος διεβίβασε τον στρατόν, ώς δε ό πολλός λόγος Έλένθεύτεν, ώς μεν έγω λέγω, κατά τας εούσας γεφύρας ώς δε άπίκετο έπι τον Αλυν ποταμον ό Κροίσος, το

of Diospolis [i.e. Thebes]. For it was from them that he himself had obtained what made most people regard him as a sage.

See also PHER. P7

Disciple of Pherecydes, Like Pythagoras?

See PYTH. P13

The Engineer (P6)

P6 (> A6) Herodotus, Histories

When Croesus arrived at the river Halys, he got his army across it, as I say for my part, on bridges that existed at the time; but according to a report widespread among the Greeks, it was Thales of Miletus who got them across for him. For when Croesus could not figure out how to get his army across the river (for they say that these bridges did not yet exist at that time), they say that Thales, who was present in the camp, made the river, which was flowing on the left side of the army, flow on its right side too. And he did this in the following way: he dug a deep canal in the shape of a crescent beginning above the camp so that the water, diverted in this way along the canal from its original course, would flow around to the rear and then, once it had passed the camp, would flow into its original bed. So that as soon as the river had been split into two it became fordable on both sides.

### The Political Advisor (P7-P8)

### **P7** (A4) Hdt. 1.170

χρηστή δὲ καὶ πρὶν ἢ διαφθαρῆναι Ἰωνίην Θαλέω ἀνδρὸς Μιλησίου ἐγένετο, τὰ ἀνέκαθεν γένος ἐόντος Φοίνικος, δς ἐκέλευε εν βουλευτήριον Ἰωνας ἐκτῆσθαι, τὸ δὲ εἶναι ἐν Τέω (Τέων γὰρ μέσον εἶναι Ἰωνίης), τὰς δὲ ἄλλας πόλιας οἰκεομένας μηδὲν ἦσσον νομίζεσθαι κατά περ εἰ δῆμοι εἶεν.

### **P8** (< A1) Diog. Laert. 1.25

δοκεί δὲ καὶ ἐν τοῖς πολιτικοῖς ἄριστα βεβουλεῦσθαι. Κροίσου γοῦν πέμψαντος πρὸς Μιλησίους ἐπὶ συμμαχία ἐκώλυσεν ὅπερ Κύρου κρατήσαντος ἔσωσε τὴν πόλιν [. . . = P11].

### Prediction of a Solar Eclipse (P9–P10)

### **P9** (A5) Hdt. 1.74

διαφέρουσι δέ σφι ἐπὶ ἴσης τὸν πόλεμον τῷ ἔκτῷ ἔτει συμβολῆς γενομένης συνήνεικε ὥστε, τῆς μάχης συνεστεώσης, τὴν ἡμέρην ἐξαπίνης νύκτα γενέσθαι. τὴν δὲ μεταλλαγὴν ταύτην τῆς ἡμέρης Θαλῆς ὁ Μιλήσιος τοῖσι Ἰωσι προηγόρευσε ἔσεσθαι, οὖρον προθέμενος ἐνιαυτὸν τοῦτον ἐν τῷ δὴ καὶ ἐγένετο ἡ μεταβολή.

<sup>&</sup>lt;sup>1</sup> This solar eclipse occurred on May 28, 585 BC. It is uncertain whether Thales possessed the means to predict it.

### The Political Advisor (P7-P8)

### P7 (A4) Herodotus, Histories

Useful too [scil. like that of Bias of Priene], before the destruction of Ionia, was that [i.e. advice] of Thales of Miletus (who was Phoenician by descent). He urged that the Ionians establish a single council, which should be located in Teos (for Teos is in the middle of Ionia), and that the other inhabited cities should be considered as being nothing less than demes.

### P8 (< A1) Diogenes Laertius

And he seems to have given excellent advice in political matters too. Indeed, when Croesus sent an embassy to the Milesians to propose an alliance, he prevented it; and this saved the city after Cyrus' victory.<sup>1</sup>

<sup>1</sup> Cyrus conquered Croesus and Lydia in the middle of the sixth century BC.

### Prediction of a Solar Eclipse (P9-P10)

### P9 (A5) Herodotus, Histories

After they [i.e. Alyattes and Cyaxares] had been waging war inconclusively, it came to pass at an encounter in the sixth year that just when they had engaged a battle, the day was suddenly transformed into night. Thales of Miletus had predicted to the Ionians that this transformation of the day would take place, and he had determined beforehand as the exact time the very year in which the change actually took place.<sup>1</sup>

**P10** (A5) Clem. Alex. Strom. 1.65

Θαλην δὲ Εὔδημος ἐν ταῖς ᾿Αστρολογικαῖς ἱστορίαις [Frag. 143 Wehrli] τὴν γενομένην ἔκλειψιν τοῦ ἡλίου προειπεῖν φησι, καθ' οῢς χρόνους συνήψαν μάχην πρὸς ἀλλήλους Μηδοί τε καὶ Λυδοὶ βασιλεύοντος Κυαξάρους μὲν τοῦ ᾿Αστυάγους πατρὸς Μήδων, ᾿Αλυάττου δὲ τοῦ Κροίσου Λυδῶν [...] εἰσὶ δὲ οἱ χρόνοι ἀμφὶ τὴν ν' Ὀλυμπιάδα.

### Married? (P11)

**P11** (< A1) Diog. Laert. 1.25–26

[...= P8] καὶ αὐτὸς¹ δέ φησιν, ὡς Ἡρακλείδης ἱστορεῖ [Frag. 45 Wehrli], μονήρη αὐτὸν γεγονέναι καὶ ἰδιαστήν. ἔνιοι δὲ καὶ γῆμαι αὐτὸν καὶ Κύβισθον υἱὸν σχεῖν οἱ δὲ ἄγαμον μεῖναι, τῆς δὲ ἀδελφῆς τὸν υἱὸν θέσθαι [...= P17a].

1 καὶ αὐτὸς ] Κλύτος Menagius

Attitude to Life (P12–P15)
Indifference to Human Affairs (P12–P13)

**P12** (A9) Plat. *Theaet*. 174a

[ΣΩ.] ὥσπερ καὶ Θαλῆν ἀστρονομοῦντα [. . .] καὶ ἄνω βλέποντα, πεσόντα εἰς φρέαρ, Θρậττά τις ἐμμελὴς

### P10 (A5) Clement of Alexandria, Stromata

Eudemus says in his *History of Astronomy* that Thales had predicted the solar eclipse which took place at the time when the Medes and the Lydians—Cyaxares, father of Astyages, was reigning over the Medes, and Alyattes, son of Croesus, over the Lydians—were joining battle with one another [. . .] This happened around the 50th Olympiad [= 580/76].

See also R15-R18

### Married? (P11)

### **P11** (< A1) Diogenes Laertius

And yet he himself says, as Heraclides [scil. of Pontus] reports, that he lived in solitude and as a private person. Some say that he married and had a son named Cybisthus, others that he remained a bachelor but adopted his sister's son [. . .].

# Attitude to Life (P12–P15) Indifference to Human Affairs (P12–P13)

### P12 (A9) Plato, Theaetetus

It is said [...] that Thales, while doing astronomy and looking upward, fell into a well, and that a witty and charming

καὶ χαρίεσσα θεραπαινὶς ἀποσκῶψαι λέγεται ὡς τὰ μὲν ἐν οὐρανῷ προθυμοῖτο εἰδέναι, τὰ δ' ἔμπροσθεν αὐτοῦ καὶ παρὰ πόδας λανθάνοι αὐτόν.

### **P13** (59 A30) Arist. *EN* 6.7 1141b2–8

διὸ [... cf. **ANAXAG. P29**] καὶ Θαλῆν καὶ τοὺς τοιούτους σοφοὺς μὲν φρονίμους δ' οὔ φασιν εἶναι, ὅταν ἄδωσιν ἀγνοοῦντας τὰ συμφέροντα ἑαυτοῖς, καὶ περιττὰ μὲν καὶ θαυμαστὰ καὶ χαλεπὰ καὶ δαιμόνια εἰδέναι αὐτούς φασιν, ἄχρηστα δ', ὅτι οὐ τὰ ἀνθρώπινα ἀγαθὰ ζητοῦσιν.

### Practicality (P14–P15)

### **P14** (Th 22 Wöhrle) Plat. Rep. 10 600a

[ΣΩ.] ἀλλ' οἷα δὴ εἰς τὰ ἔργα σοφοῦ ἀνδρὸς πολλαὶ ἐπίνοιαι καὶ εὐμήχανοι εἰς τέχνας ἤ τινας ἄλλας πράξεις λέγονται, ὥσπερ αὖ Θάλεώ τε πέρι τοῦ Μιλησίου καὶ ἀναχάρσιος τοῦ Σκύθου;

### **P15** (< A10) Arist. *Pol*. 1.11 1259a9–18

όνειδιζόντων γὰρ αὐτῷ διὰ τὴν πενίαν ὡς ἀνωφελοῦς τῆς φιλοσοφίας οὔσης, κατανοήσαντά φασιν αὐτὸν

Thracian handmaiden made fun of him, saying that he was eager to know what was in the sky but did not see what was in front of him and at his feet.<sup>1</sup>

<sup>1</sup> This anecdote, which may derive from Aesop (Fab. 40 Hausrath, 65 Chambry) and was destined to enjoy an enormous success, is repeated and varied in a large number of texts (including e.g. **ANAXIMEN. R11a**; Diogenes Laertius 1.34; (Ps.?)-Hippolytus, *Refutation of All Heresies* 1.1; etc.).

### P13 (59 A30) Aristotle, Nicomachean Ethics

That [scil. because wisdom is knowing what is most honorable by nature] is why people say that [. . .] Thales and men like that are wise but not prudent, when they see that they do not know what is advantageous for themselves; and they say that what they know is extraordinary and marvelous and difficult and divine—but useless, since they do not try to find what is good for humans.

### Practicality (P14–P15)

### P14 (≠ DK) Plato, Republic

[Socrates:] Or, as would be appropriate for the accomplishments of a wise man, are many ingenious inventions for the arts or any other practical activities reported [scil. for Homer] as they are for Thales of Miletus and Anacharsis the Scythian?

### **P15** (< A10) Aristotle, *Politics*

As people reproached him on account of his poverty, saying that philosophy is useless, he is reported to have ascer-

ἐλαιῶν φορὰν ἐσομένην ἐκ τῆς ἀστρολογίας, ἔτι χειμῶνος ὅντος εὐπορήσαντα χρημάτων ὀλίγων ἀρραβῶνας διαδοῦναι τῶν ἐλαιουργίων τῶν τ' ἐν Μιλήτω καὶ Χίω πάντων, ὀλίγου μισθωσάμενον ἅτ' οὐθενὸς ἐπιβάλλοντος ἐπειδὴ δ' ὁ καιρὸς ἡκε, πολλῶν ζητουμένων ἄμα καὶ ἐξαίφνης, ἐκμισθοῦντα ὃν τρόπον ἡβούλετο, πολλὰ χρήματα συλλέξαντα ἐπιδεῖξαι ὅτι ράδιόν ἐστι πλουτεῖν τοῖς φιλοσόφοις, ἂν βούλωνται, ἀλλ' οὐ τοῦτ' ἐστὶ περὶ ὃ σπουδάζουσιν.

Apothegms and Other Sayings (P16–P18)

**P16** (< A1) Diog. Laert. 1.35

τῶν τε ἀδομένων αὐτοῦ τάδε εἶναι·

οὔ τι τὰ πολλὰ ἔπη φρονίμην ἀπεφήνατο δόξαν· ἔν τι μάτευε σοφόν, ἔν τι κεδνὸν αἱροῦ· λύσεις¹ γὰρ ἀνδρῶν κωτίλων γλώσσας ἀπεραντολόγους. [SH 521]

 $1 \delta \eta \sigma \epsilon \iota s$  Diels

**P17** (< A1) Diog. Laert.

**a** 1.26

[. . . = P11] ὅτε καὶ ἐρωτηθέντα διὰ τί οὐ τεκνοποιεῖ, διὰ φιλοτεκνίαν εἰπεῖν. καὶ λέγουσιν ὅτι τῆς μητρὸς

tained on the basis of astronomy, while the winter was still in its course, that there was going to be a large crop of olives; with the little money he possessed, he paid deposits on all the olive-presses in Miletus and Chios, renting them cheaply since no one was competing with him. When the moment came, as all at once many people needed them suddenly, he rented them out at as high a price as he pleased and made a lot of money—thereby demonstrating that it is easy for philosophers to become rich if they wish, but that this is not what they are eager to do.

### Apothegms and Other Sayings (P16–P18)1

<sup>1</sup> Some of these sayings are also attributed to the Seven Sages (cf. **MOR. T35**).

### P16 (< A1) Diogenes Laertius

Among his songs there are the following:

Many words do not manifest a sensible opinion. Search for one thing: what is wise. Choose one thing: what is good. For you will undo the endlessly talking tongues Of chattering men.

### **P17** (< A1) Diogenes Laertius

a

[...] When he was asked why he did not have children, he replied, "because of my love for children." And they say

ἀναγκαζούσης αὐτὸν γῆμαι, ἔλεγεν, οὐδέπω καιρός. εἶτα, ἐπειδὴ παρήβησεν ἐγκειμένης, εἰπεῖν, οὐκέτι καιρός.

#### **b** 1.33

Έρμιππος δ' ἐν τοῖς Βίοις [Frag. 11 Wehrli] εἰς τοῦτον ἀναφέρει τὸ λεγόμενον ὑπό τινων περὶ Σωκράτους. ἔφασκε γάρ, φασί, τριῶν τούτων ἕνεκα χάριν ἔχειν τῆ τύχη πρῶτον μὲν ὅτι ἄνθρωπος ἐγενόμην καὶ οὐ θηρίον, εἶτα ὅτι ἀνὴρ καὶ οὐ γυνή, τρίτον ὅτι Ἑλλην καὶ οὐ βάρβαρος.

#### **c** 1.35–37

φέρεται δὲ καὶ ἀποφθέγματα αὐτοῦ τάδε· πρεσβύτατον τῶν ὅντων θεός· ἀγένητον γάρ. κάλλιστον κόσμος· ποίημα γὰρ θεοῦ. μέγιστον τόπος· ἄπαντα γὰρ χωρεῖ. τάχιστον νοῦς· διὰ παντὸς γὰρ τρέχει. ἰσχυρότατον ἀνάγκη· κρατεῖ γὰρ πάντων. σοφώτατον χρόνος· ἀνευρίσκει γὰρ πάντα.

οὐδὲν ἔφη τὸν θάνατον διαφέρειν τοῦ ζῆν. σὰ οὖν, ἔφη τις, διὰ τί οὐκ ἀποθνήσκεις; ὅτι, ἔφη, οὐδὲν διαφέρει.

[36] πρὸς τὸν πυθόμενον τί πρότερον γεγόνοι, νὺξ η ἡμέρα, ἡ νύξ, ἔφη, μιὰ ἡμέρα πρότερον.

ηρώτησέ τις αὐτὸν εἰ λήθοι θεοὺς ἄνθρωπος ἀδικῶν ἀλλ' οὐδὲ διανοούμενος, ἔφη. πρὸς τὸν μοιχὸν

that when his mother tried to compel him to marry he would say, "It is not yet the right time," and then, as she insisted when he was no longer young, "It is no longer the right time."

#### b

Hermippus in his *Lives* attributes to him what certain people say about Socrates. For they say that he used to say that he was grateful to fortune for three things: first, that he was born a human being and not an animal; second, that he was born a man and not a woman; and third, that he was born a Greek and not a barbarian.

C

The following sayings of his are also reported: "The oldest of beings is god; for he is unborn." "The most beautiful thing is the world; for it was made by god." "The biggest thing is place; for it contains everything." "The fastest thing is mind; for it races through everything." "The strongest thing is necessity; for it rules over everything." "The wisest thing is time; for it discovers everything."

He said that death is not at all different from life. Someone said, "Then why don't you die?" He answered, "Because there is no difference."

[36] To the man who wanted to know which came about earlier, night or day, he replied, "Night, earlier by a day."

Someone asked him whether a man escapes the notice of the gods if he commits injustice; he answered, "not even

ἐρόμενον εἰ ὀμόσ $\eta^1$  μὴ μεμοιχευκέναι, οὐ χεῖρον, ἔφη, μοιχείας ἐπιορκία;<sup>2</sup>

έρωτηθεὶς τί δύσκολον, ἔφη, τὸ ἑαυτὸν γνῶναι· τί δὲ εὔκολον, τὸ ἄλλῳ ὑποθέσθαι· τί ἥδιστον, τὸ ἐπιτυγχάνειν· τί τὸ θεῖον, τὸ μήτε ἀρχὴν ἔχον μήτε τελευτήν. τί δὲ καινὸν εἴη τεθεαμένος ἔφη· γέροντα τύραννον.

πῶς ἄν τις ἀτυχίαν ῥᾶστα φέροι, εἰ τοὺς ἐχθροὺς χεῖρον πράσσοντας βλέποι πῶς ἃν ἄριστα καὶ δικαιότατα βιώσαιμεν, ἐὰν ἃ τοῖς ἄλλοις ἐπιτιμῶμεν, αὐτοὶ μὴ δρῶμεν [37] τίς εὐδαίμων, ὁ τὸ μὲν σῶμα ὑγιής, τὴν δὲ ψυχὴν εὔπορος, τὴν δὲ φύσιν εὖπαίδευτος.

φίλων παρόντων καὶ ἀπόντων μεμνησθαί φησι· μη την ὄψιν καλλωπίζεσθαι, ἀλλὰ τοῖς ἐπιτηδεύμασιν εἶναι καλόν.

μὴ πλούτει, φησί, κακῶς, μηδὲ διαβαλλέτω σε λόγος πρὸς τοὺς πίστεως κεκοινωνηκότας.

οθς ἂν ἐράνους εἰσενέγκης, φησί, τοῖς γονεῦσιν, τοὺς αὐτοὺς προσδέχου καὶ παρὰ τῶν τέκνων.

 $^{1}$  ὀμόσηει mss., corr. Roeper  $^{2}$  ita interpunxit Sternbach  $^{3}$  ψυχὴν  $\mathrm{BP}^{1}$  (Q):  $\tau \dot{\nu} \chi \eta \nu$   $\mathrm{FP}^{3}$   $^{4}$  φύσιν  $\mathrm{BP}^{1}$  (Q): ψυχὴν  $\mathrm{FP}^{3}$ 

### **d** 1.40

τούτου ἐστὶν τὸ Γνῶθι σαυτόν, ὅπερ ἀντισθένης ἐν ταῖς Διαδοχαῖς Φημονόης εἶναί φησιν [FGrHist 508 F3], ἐξιδιοποιήσασθαι δὲ αὐτὸ Χίλωνα.

if he intends to." And to the adulterer who asked whether he should swear that he had not committed adultery, he answered, "Is not perjury worse than adultery?"

Asked what is difficult, he answered, "to know oneself"; what is easy, "to give advice to someone else"; what is most pleasant, "to have success"; what is divine, "that which has neither beginning nor end"; what was the most unheard of thing he had seen, he said, "an old tyrant."

How one could most easily endure misfortune? "If one sees one's enemies doing worse." How we could live best and most justly? "If we do not do ourselves what we blame others for doing." [37] Who is happy? "He who is healthy in body, resourceful in spirit, well trained in nature."

He says that we should remember our friends, be they present or absent; not to beautify our appearance, but to be beautiful in what we do.

He says, "Do not enrich yourself dishonestly, nor let any utterance set you against those who share your trust."

He says, "The very same favors that you did for your parents, expect them from your children too."

#### d

To him belongs the saying "Know yourself," which Antisthenes in his *Successions* attributes to Phemonoê, saying that Chilon appropriated it for himself.

**P18** (< A19) Apul. *Flor*. 18

"[. . .] satis [. . .] mihi fuerit mercedis [. . .] si id quod a me didicisti cum proferre ad quosdam coeperis, sibi non adsciveris, sed eius inventi me potius quam alium repertorem praedicaris."

### Death (P19)

**P19** (< A1) Diog. Laert. 1.39

δ δ' οὖν σοφὸς ἐτελεύτησεν ἀγῶνα θεώμενος γυμνικον ὑπό τε καύματος καὶ δίψους καὶ ἀσθενείας, ἤδη γηραιός.

### Statue (P20)

P20 (< A1) Diog. Laert. 1.34 (< Lobon Frag. 1 Garulli]

[. . . =  $\mathbf{R8}$ ] ἐπιγεγρά $\phi\theta$ αι δ' αὐτοῦ ἐπὶ τῆς εἰκόνος τόδε·

τόνδε Θαλην Μίλητος 'Ιὰς θρέψασ' ἀνέδειξεν ἀστρολόγων πάντων πρεσβύτατον σοφίη.

### P18 (< A19) Apuleius, Florida

[to Mandrolytus of Priene, who offered to pay him whatever he wished for teaching him the calculation of the sun's orbit, cf. **R13**:] "It would be an adequate recompense for me [...] if, when you begin to tell people what you have learned from me, you do not attribute it to yourself but declare that I am the author of this discovery rather than anyone else."

### *Death* (*P1*9)

### P19 (< A1) Diogenes Laertius

This sage died while he was observing an athletic competition, because of the heat, thirst, and his weakness, when he was already old.

### Statue (P20)

### **P20** (< A1) Diogenes Laertius

[...] [Scil. Lobon says that] his statue bears the following inscription:

Ionian Miletus nursed this man, Thales, and revealed him

As the most venerable of all astronomers in wisdom.

### Iconography (P21)

**P21** (≠ DK) Richter I, pp. 82–83 and Figures 321–25; Richter-Smith, pp. 209–10 and Figures 171–72; Koch, "Ikonographie," in Flashar, Bremer, Rechenauer (2013), I.1, pp. 217–19.

### THALES [11 DK]

D

### Thales (Probably) Left Behind No Writings (D1–D2)

**D1** (< A1) Diog. Laert. 1.23

καὶ κατά τινας μὲν σύγγραμμα κατέλι $\pi$ εν οὐδέν [. . . =  $\mathbf{R6}$ ].

**D2** (< Th 184 Wöhrle) Gal. *In. Hipp. Nat. hom.* 1.27 (= p. 37.9–11 Mewaldt)

[. . .] ὅτι Θαλῆς ἀπεφήνατο στοιχεῖον μόνον εἶναι τὸ ὕδωρ, ἐκ συγγράμματος αὐτοῦ δεικνύναι οὐκ ἔχομεν, ἀλλ' ὅμως ἄπασι καὶ τοῦτο πεπίστευται.

### Water as the Principle (D3–D4)

D3 (< A12) Arist. Metaph. A3 983b18-22</li>
 τὸ μέντοι πληθος καὶ τὸ εἶδος της τοιαύτης ἀρχης οὐ

D

### Thales (Probably) Left Behind No Writings (D1-D2)

### **D1** (< A1) Diogenes Laertius

According to some, he did not leave behind a written treatise [. . .].

## **D2** (≠ DK) Galen, Commentary on Hippocrates' On the Nature of Man

[. . .] we are not able to demonstrate on the basis of a treatise by Thales that he declared that water was the only element, even if this is what everyone believes.

### Water as the Principle (D3–D4)

### **D3** (< A12) Aristotle, *Metaphysics*

However, not all [scil. of those earliest philosophers who assert that things comes from a substrate] say the same

τὸ αὐτὸ πάντες λέγουσιν, ἀλλὰ Θαλῆς μὲν [... =  $\mathbf{R9}$ ] ὕδωρ φησὶν εἶναι (διὸ καὶ τὴν γῆν ἐφ' ὕδατος ἀπεφήνατο εἶναι) [... =  $\mathbf{R32a}$ ].

### **D4** (< Th 210 Wöhrle) (Ps.-?) Hippol. Ref. 1.1

[. . . = R12] οὖτος ἔφη ἀρχὴν τοῦ παντὸς εἶναι καὶ τέλος τὸ ὕδωρ. ἐκ γὰρ αὐτοῦ τὰ πάντα συνίστασθαι πηγνυμένου καὶ πάλιν διανιεμένου ἐπιφέρεσθαί τε αὐτῷ τὰ πάντα, ἀφ' οὖ καὶ σεισμοὺς καὶ πνευμάτων συστροφὰς καὶ ἄστρων κινήσεις γίνεσθαι [. . . = R39].

### The World (D5)

**D5** (A13b) Aët. 2.1.2 (Ps.-Plut.) [περὶ κόσμου] Θαλῆς καὶ οἱ ἀπ' αὐτοῦ ἕνα τὸν κόσμον.

### The Heavenly Bodies (D6)

**D6** (A17a) Aët.

a 2.13.1 (Ps.-Plut.) [τίς ἡ οὐσία τῶν ἄστρων πλανητῶν καὶ ἀπλανῶν]

Θαλής γεώδη μεν έμπυρα δε τὰ ἄστρα.

b 2.20.9 (Stob.) [περὶ οὐσίας ἡλίου]
Θαλῆς γεοειδῆ τὸν ἥλιον.

thing regarding the number and the kind of a principle of this sort. But Thales [...] says it is water (and it is for this reason that he declared that the earth rests upon water) [...].

**D4** ( $\neq$  DK) (Ps.-?) Hippolytus, Refutation of All Heresies [...] He said that the beginning of everything and its end is water. For it is out of this that all things are formed, when it solidifies and liquefies in turn, and all things rest upon it, and it is also from this that earthquakes, concentrations of winds, and the motions of the stars come [...].

<sup>1</sup> This explanation seems more like reconstruction (of Aristotelian origin) than information.

### The World (D5)

D5 (A13b) Aëtius

Thales and those who follow him: there is [scil. only] one world.

### The Heavenly Bodies (D6)

D6 (A17a) Aëtius

 $\mathbf{a}$ 

Thales: the stars are made of earth, but they are on fire.

h

Thales: the sun is made of earth.

The Earth (D7–D8)

D7 (< A14) Arist. Cael. 2.13 294a28-32

οί δ' ἐφ' ὕδατος κεῖσθαι. τοῦτον γὰρ ἀρχαιότατον παρειλήφαμεν τὸν λόγον, ὅν φασιν εἰπεῖν Θαλῆν τὸν Μιλήσιον, ὡς διὰ τὸ πλωτὴν εἶναι μένουσαν ὥσπερ ξύλον ἤ τι τοιοῦτον ἔτερον (καὶ γὰρ τούτων ἐπ' ἀέρος μὲν οὐθὲν πέφυκε μένειν, ἀλλ' ἐφ' ὕδατος) [. . . = **R33a**].

**D8** (< A15) Sen. Quaest. nat. 3.14

ait enim terrarum orbem aqua sustineri et vehi more navigii mobilitateque eius fluctuare, tum quum dicitur tremere. non est ergo mirum si abundat humor ad flumina fundenda, quum mundus in humore sit totus.

### The Flooding of the Nile (D9)

**D9** (A16) Aët. 4.1.1 (Ps.-Plut.)  $[\pi \epsilon \rho \hat{i} \, N \epsilon \hat{i} \lambda o \nu \, d\nu \alpha \beta d\sigma \epsilon \omega \varsigma]$ 

Θαλής τοὺς ἐτησίας ἀνέμους οἴεται πνέοντας τῆ Αἰγύπτω ἀντιπροσώπους ἐπαίρειν τοῦ Νείλου τὸν ὄγκον διὰ τὸ τὰς ἐκροὰς αὐτοῦ τῆ παροιδήσει τοῦ ἀντιπαρήκοντος πελάγους ἀνακόπτεσθαι.

### The Earth (D7-D8)

### **D7** (< A14) Aristotle, On the Heavens

The others say that it [i.e. the earth] rests on water. For the most ancient explanation that has come down to us, which they say that Thales of Miletus stated, is that it stays put because it floats like wood or something else of this sort (for by nature none of these things stays put in the air, but rather on water) [...].

### D8 (< A15) Seneca, Natural Questions

For he says that the terrestrial globe rests upon water and moves like a boat and fluctuates by reason of its mobility when there is what is called an earthquake. So it is not surprising if there is an abundant quantity of fluid that pours forth as streams, since the whole world is located in a fluid.

### The Flooding of the Nile (D9)

### D9 (A16) Aëtius

Thales thinks that the Etesian winds that blow upon Egypt in the opposite direction raise the Nile's bulk because its outflow is driven back by the swelling of the sea which comes to meet it.<sup>1</sup>

<sup>1</sup> Herodotus 2.20 mentions this theory without attributing it to anyone.

Souls and Divinities (D10-D11)

**D10** (< A22) Arist. An. 1.5 411a7–8

[. . .]  $\Theta a \lambda \hat{\eta} \varsigma \ \mathring{\omega} \acute{\eta} \theta \eta \ \pi \acute{a} \nu \tau a \ \pi \lambda \acute{\eta} \rho \eta \ \theta \epsilon \hat{\omega} \nu \ \epsilon \hat{\iota} \nu a \iota$ .

#### **D11**

**a** (A22) Arist. An. 1.2 405a19–21

ἔοικε δὲ καὶ Θαλῆς έξ ὧν ἀπομνημονεύουσι κινητικόν τι τὴν ψυχὴν ὑπολαβεῖν, εἴπερ τὸν λίθον ψυχὴν ἔχειν ὅτι τὸν σίδηρον κινεῖ.

**b** (< A1) Diog. Laert. 1.24

[... = R37] 'Αριστοτέλης [D11a] δὲ καὶ "Ιππίας [HIP-PIAS D23] φασὶν αὐτὸν καὶ ἀψύχοις μεταδιδόναι ψυχῆς, τεκμαιρόμενον ἐκ τῆς λίθου τῆς μαγνήτιδος καὶ τοῦ ἠλέκτρου.

### Souls and Divinities (D10-D11)

**D10** (< A22) Aristotle, On the Soul

[. . .] Thales thought that all things are full of gods.<sup>1</sup>

<sup>1</sup> Cf. Plato, *Laws* 899b.

See also R34a

#### **D11**

a (A22) Aristotle, On the Soul

Thales too seems, from what is reported, to have thought that the soul is something that moves, for he says that the stone [i.e. the magnet] has a soul, given that it moves iron.

### **b** (< A1) Diogenes Laertius

[...] Aristotle and Hippias say that he attributed a soul to inanimate beings too, judging from the evidence of the magnet and of amber.

R

Earliest Testimonies to His Fame Xenophanes, Heraclitus, Herodotus, and Democritus (R1)

**R1** (< A1) Diog. Laert. 1.23

[... =  $\mathbf{R15}$ ] ὅθεν αὐτὸν καὶ Ξενοφάνης καὶ Ἡρόδοτος θαυμάζει. μαρτυρεῖ δ' αὐτῷ καὶ Ἡράκλειτος καὶ Δημόκριτος.

Hippias

See THAL. D11b

Aristophanes

See **DRAM. T13-T14** 

R

Earliest Testimonies to His Fame Xenophanes, Heraclitus, Herodotus, and Democritus (R1)

R1 (< A1) Diogenes Laertius

[...] That is why Xenophanes and Herodotus [cf. **P2**, **P6**, **P7**, **P9**] admire him. Heraclitus [cf. **HER. D26**] and Democritus [cf. **THAL. P2**] also bear witness to him.

Hippias

See THAL. D11b

Aristophanes

See **DRAM.** T13-T14

From the Sage to the Theoretician (R2-R4)

R2 (< Th 20 Wöhrle) Plat. Prot. 343a

[ΠΡ.] τούτων ἦν καὶ Θαλῆς ὁ Μιλήσιος καὶ Πιττακὸς ὁ Μυτιληναῖος καὶ Βίας ὁ Πριηνεὺς καὶ Σόλων ὁ ἡμέτερος καὶ Κλεόβουλος ὁ Λίνδιος καὶ Μύσων ὁ Χηνεύς, καὶ ἔβδομος ἐν τούτοις ἐλέγετο Λακεδαιμόνιος Χίλων.

**R3** (Th 110 Wöhrle) Plut. Sol. 3.8.1–3 80B–C

καὶ ὅλως ἔοικεν ἡ Θάλεω μόνου σοφία τότε περαίτερω τῆς χρείας ἐξικέσθαι τῆ θεωρία· τοῖς δ' ἀλλοις ἀπὸ τῆς πολιτικῆς ἀρετῆς τοὕνομα τῆς σοφίας ὑπῆρξε.

**R4** (< A1) Diog. Laert. 1.34

οἶδε δ' αὐτὸν ἀστρονομούμενον καὶ Τίμων, καὶ ἐν τοῖς Σίλλοις ἐπαινεῖ αὐτὸν λέγων [Frag. 23 Di Marco]·

οἷόν  $\theta$ ' έπτὰ Θάλητα σοφῶν σοφὸν  $\langle \dot{a}\sigma\tau\rhoονομῆσαι\rangle^{1}[...=\mathbf{R8}]$ 

1 <ἀστρονομῆσαι> Magnelli

Alleged Writings (R5-R8)

**R5** (< A11) Flav. Jos. Apion. 1.2

άλλὰ μὴν καὶ τοὺς περὶ τῶν οὐρανίων τε καὶ θείων 240

### From the Sage to the Theoretician (R2-R4)

### **R2** (≠ DK) Plato, *Protagoras*

[Protagoras:] To such men [scil. those capable of making laconic pronouncements] belonged Thales of Miletus, Pittacus of Mytilene, Bias of Priene, our own Solon, Cleobulus of Lindos, Myson of Chenae, and people say that the seventh among them was Chilon of Sparta [cf. MOR. T35].

### **R3** ( $\neq$ DK) Plutarch, Solon

And in general it seems that at that time only Thales' wisdom, by reason of its theoretical aspect, went beyond practical necessity: the others [scil. of the Seven Sages] possess the name of wisdom from their excellence in politics.

### R4 (< A1) Diogenes Laertius

Timon too knows of him as an astronomer, and he praises him in his *Mockeries* (*Silloi*), saying,

As, among the Seven Sages, Thales the sage

See also P1b

### Alleged Writings (R5–R8)

**R5** (< A11) Flavius Josephus, Against Apion

Everyone agrees unanimously that the first Greeks who

πρώτους παρ' Έλλησι φιλοσοφήσαντας, οἷον [... = **PHER. P8**] Θάλητα, πάντες συμφώνως όμολογοῦσιν [...] ὀλίγα συγγράψαι καὶ ταῦτα τοῖς Έλλησιν εἶναι δοκεῖ πάντων ἀρχαιότατα, καὶ μόλις αὐτὰ πιστεύουσιν ὑπ' ἐκείνων γεγράφθαι.

## **R6** (< A1) Diog. Laert. 1.23

[. . . = **D1**] ή γὰρ εἰς αὐτὸν ἀναφερομένη Ναυτικὴ ἀστρολογία Φώκου λέγεται εἶναι τοῦ Σαμίου. [. . .] κατά τινας δὲ μόνα δύο συνέγραψε, Περὶ τροπῆς καὶ Ἰσημερίας, τὰ ἄλλ' ἀκατάληπτα εἶναι δοκιμάσας.

## **R7** (< B1) Plut. *Pyth. orac.* 18 403A

[. . .] εἴ γε Θαλῆς ἐποίησεν ὡς ἀληθῶς εἰπεῖν <τὴν> εἰς αὐτὸν¹ ἀναφερομένην ἀστρολογίαν.

1 < τ ην > είς αὐτὸν Turnebus: είς αὐτην mss.

## **R8** (< A1) Diog. Laert. 1.34

[. . . =  $\mathbf{R4}$ ] ἀστρονομήματα<sup>1</sup> δὲ γεγραμμένα ὑπ' αὐτοῦ φησι Λόβων ὁ ᾿Αργεῖος [Frag. 1 Garulli] εἰς ἔπη τείνειν διακόσια [. . .].

 $^1$  ἀστρονομήματα  $BP^1(Q)$   $F^2$ : ἀστρονόμημα. τὰ  $F^1P^4$ 

philosophized about celestial phenomena and divine matters, like [. . .] Thales, [. . .] wrote only very little; these writings seem to the Greeks to be the most ancient ones of all, and they can scarcely believe that they were written by them.

# R6 (< A1) Diogenes Laertius

[...] for the *Nautical Astronomy* attributed to him is said to be by Phocus of Samos. [...] But according to other people he wrote only two works, *On the Solstice* and *On the Equinox*, for he was of the opinion that everything else was impossible to know.

# R7 (< B1) Plutarch, On the Pythian Oracles

[. . .] if Thales really did write the *Astronomy* that is attributed to him.

# **R8** (< A1) Diogenes Laertius

[. . .] Lobon of Argos says that what was written by him about astronomy amounts to two hundred lines [. . .].

See also R44

The Science of Nature (R9–R12)

**R9** (< A12) Arist. *Metaph*. A3 983b20–21

[... =  $\mathbf{D3}$ ]  $\Theta a \lambda \hat{\eta}_S \mu \hat{\epsilon} \nu \delta \tau \hat{\eta}_S \tau o i a \acute{\nu} \tau \eta_S \dot{a} \rho \chi \eta \gamma \delta_S \phi i \lambda o - \sigma o \phi i a_S [... = <math>\mathbf{R32a}$ ].

**R10** (< B1) Simpl. *In Phys.*, p. 23.29–32

Θαλής δὲ πρῶτος παραδέδοται τὴν περὶ φύσεως ἱστορίαν τοῖς Ελλησιν ἐκφῆναι, πολλῶν μὲν καὶ ἄλλων προγεγονότων, ὡς καὶ τῷ Θεοφράστῳ δοκεῖ [< Frag. 225 FHS&G], αὐτὸς δὲ πολὺ διενεγκὼν ἐκείνων, ὡς ἀποκρύψαι πάντας τοὺς πρὸ αὐτοῦ.

R11 (< A1) Diog. Laert. 1.23, 24

μετὰ δὲ τὰ πολιτικὰ τῆς φυσικῆς ἐγένετο θεωρίας. [...] πρῶτος δὲ καὶ περὶ φύσεως διελέχθη, ὥς τινες.

**R12** (< Th 210 Wöhrle) (Ps.-?) Hippol. Ref. 1.1

λέγεται Θαλην τὸν Μιλήσιον ἕνα τῶν ἑπτὰ σοφῶν πρῶτον ἐπικεχειρηκέναι φιλοσοφίαν φυσικήν. [. . . = **D4**]

The Initiator of the Ionian Line of Descent of Greek Philosophy

See **DOX. T20, T21** 

The Science of Nature (R9-R12)

R9 (< A12) Aristotle, Metaphysics

[...] Thales, the founder of this sort of philosophy [i.e. the one that asserts that things derive from one or more principles that serve as their substrate] [...].

**R10** (< B1) Simplicius, Commentary on Aristotle's Physics

Thales is reported to have been the first to reveal the study of nature to the Greeks; many others had preceded him, as is the view of Theophrastus too, but he was far superior to them so that he eclipsed all his predecessors.

## R11 (< A1) Diogenes Laertius

After having engaged in politics, he devoted himself to the observation of nature. [. . .] And he was the first to speak about nature as well, according to some people.

**R12** (≠ DK) (Ps.-?) Hippolytus, Refutation of All Heresies

They say that Thales of Miletus, one of the Seven Sages, was the first to make an attempt at natural philosophy.

The Initiator of the Ionian Line of Descent of Greek Philosophy

See DOX. T20, T21

Scientific Discoveries Attributed to Thales (R13-R31) A General Catalog (R13)

# **R13** (< A19) Apul. *Flor.* 18

Thales Milesius ex septem illis sapientiae memoratis viris facile praecipuus (enim geometricae penes Graios primus repertor et naturae certissimus explorator et astrorum peritissimus contemplator) maximas res parvis lineis repperit: temporum ambitus, ventorum flatus, stellarum meatus, tonitruum sonora miracula, siderum obliqua curricula, solis annua reverticula: itidem lunae vel nascentis incrementa, vel senescentis dispendia, vel delinquentis obstiticula. idem sane iam proclivi senectute divinam rationem de sole commentus est; quam equidem non didici modo, verum etiam experiundo comprobavi: quoties sol magnitudine sua circulum, quem permeat, metiatur.

# Scientific Discoveries Attributed to Thales (R13–R31)<sup>1</sup> A General Catalog (R13)

<sup>1</sup> Among the many other discoveries attributed to Thales are the armillary sphere (Cicero, *On the Republic* 1.22), the solstices (Heron, *Definitions* 138.11 = Eudemus, Frag. 145 Wehrli), and the phases of the moon and the equinoxes (Eusebius, *Evangelical Preparation* 10.14.10).

# R13 (< A19) Apuleius, Florida

Thales of Miletus, the most preeminent by far of those Seven famous for their wisdom—indeed, he was the first among the Greeks to discover geometry, and was an unerring investigator of nature and a most experienced observer of the stars—discovered the greatest things by means of small lines: the procession of the seasons, the blowing of the winds, the course of the stars, the prodigious sounds of thunderclaps, the slanting trajectory of the stars, the yearly reversion of the sun; and so too the increases of the moon when it waxes, its decreases when it wanes, the obstacles when it is eclipsed. The same man, though already in advanced old age, invented a divine calculation with regard to the sun, which I not only learned but have also confirmed by experiment: it measures the orbit that the sun follows as a multiple of the sun's magnitude.

Astronomical Discoveries (R14-R25) Trajectory and Size of the Sun (R14)

## **R14** (< A1) Diog. Laert. 1.24

πρώτος δὲ καὶ τὴν ἀπὸ τροπῆς ἐπὶ τροπὴν πάροδον εὖρε, καὶ πρώτος τὸ τοῦ ἡλίου μέγεθος <τοῦ ἡλιακοῦ κύκλου ὥσπερ καὶ τὸ τῆς σελήνης μέγεθος >1 τοῦ σεληναίου ἐπτακοσιοστὸν καὶ εἰκοστὸν μέρος ἀπεφήνατο κατά τινας.

<sup>1</sup> suppl. Diels

The Solar Eclipse (R15–R18)

## **R15** (< A1) Diog. Laert. 1.23

δοκεί δὲ κατά τινας πρώτος ἀστρολογήσαι καὶ ἡλιακὰς ἐκλείψεις καὶ τροπὰς προειπεῖν, ὥς φησιν Εὔδημος ἐν τῆ περὶ τῶν ᾿Αστρολογουμένων ἱστορίᾳ [Frag. 144 Wehrli] [. . . = **R1**].

# **R16** (< A17) Theon Sm. *Exp.*, p. 198.14–18

Εὔδημος ἱστορεῖ ἐν ταῖς ᾿Αστρολογίαις [Frag. 145 Wehrli] [. . .] Θαλῆς δὲ ἡλίου ἔκλειψιν καὶ τὴν κατὰ τὰς τροπὰς αὐτοῦ περίοδον, ὡς οὐκ ἴση ἀεὶ συμβαίνει·

# Astronomical Discoveries (R14-R25) Trajectory and Size of the Sun (R14)

## **R14** (< A1) Diogenes Laertius

He was the first to discover the trajectory from one tropic to the other, and according to some people the first to declare that the size of the sun <is the 720th part of the solar circle, and the size of the moon > is the 720th part of the lunar one.

## The Solar Eclipse (R15–R18)

## **R15** (< A1) Diogenes Laertius

Some people are of the view that he was the first to do astronomy and to predict solar eclipses and solstices, as Eudemus says in his *History of Astronomy*.

R16 (< A17) Theon of Smyrna, Mathematics Useful for Understanding Plato (extract from Dercyllides)

Eudemus reports in his *Astronomy* [...] that Thales [scil. was the first to discover] the eclipse of the sun and the fact that the periodicity of its revolutions is not always equal.

**R17** (Th 91 Wöhrle) Aristarch. Samius in Comm. in *Od.* 20.156 (P.Oxy. 3710 Col. 2.36–43; vol. 53 [1986], 96–97, ed. Haslam)

ὅτι ἐν νουμηνίαι αἱ ἐκλείψεις δηλο[î] Ι ἀρίσταρχος ὁ Σάμ[ι]ος γράφων ἔφη τε Ι ὁ μὲν Θαλῆς ὅτι ἐκλείπειν τὸν ἥλ[ι]ον σελήνης ἐπίπροσθεν αὐτῶι γενομένης, σημειουμέ[νης c. 6] . . . τῆς Ι ἡμέρας, ἐν ἡι ποιεῖται τὴν ἔγλειψιν, Ι ἡ[ν] οἱ μὲν τριακάδα καλοῦσιν ο[ί] δὲ νου|μηνίαν.

**R18** (< A17a) Aët. 2.24.1 (Ps.-Plut.) [περὶ ἐκλείψεως ἡλίου]

Θαλής πρώτος ἔφη ἐκλείπειν τὸν ἥλιον τής σελήνης αὐτὸν ὑπερχομένης κατὰ κάθετον, οὔσης φύσει γεώδους. βλέπεσθαι δὲ τοῦτο κατοπτρικώς ὑποτιθεμένω τῷ δίσκω.

1 verbum obscurum et fortasse corruptum

The Light of the Moon (R19)

**R19** (A17b) Aët. 2.28.5 (Stob.)  $[\pi \epsilon \rho \hat{\iota} \phi \omega \tau \iota \sigma \mu \hat{\omega} \nu \sigma \epsilon - \lambda \dot{\eta} \nu \eta \varsigma]$ 

Θαλής πρώτος έφη ύπὸ τοῦ ήλίου φωτίζεσθαι τὴν σελήνην.

**R17** (≠ DK) Aristarchus of Samos in an anonymous commentary on Homer's *Odyssey* 

The fact that eclipses take place at the new moon is explained by Aristarchus of Samos, who writes, "Thales said that the sun is eclipsed when the moon comes to be located in front of it, the day on which it produces the eclipse (some people call this day 'the thirtieth' and others 'the new moon') being marked [...]."

## **R18** (< A17a) Aëtius

Thales was the first to say that an eclipse of the sun occurs when the moon, which by nature is made of earth, passes perpendicularly beneath it; this is seen in the manner of a mirror (?), when the disk comes to be placed under it.

## The Light of the Moon (R19)

## R19 (A17b) Aëtius

Thales was the first to say that the moon is illuminated by the sun.<sup>1</sup>

<sup>1</sup> This is a typical case of honorific attribution. In fact, the discovery belongs to Parmenides (**PARM. D28**).

Other Heavenly Bodies (R20-R22)

**R20** (< A1) Diog. Laert. 1.23

Καλλίμαχος δ' αὐτὸν οἶδεν εύρετὴν τῆς ἄρκτου τῆς μικρᾶς λέγων ἐν τοῖς Ἰάμβοις οὕτως.

καὶ τῆς ἁμάξης ἐλέγετο σταθμήσασθαι τοὺς ἀστερίσκους, ἡ πλέουσι Φοίνικες [Frag. 191.54–55 Pfeiffer]

## **R21** (A18) Plin. Nat. hist. 18

occasum matutinum Vergiliarum Hesiodus (nam huius quoque nomine exstat Astrologia) tradidit fieri, quum aequinoctium autumni conficeretur [Frag. 290 Merkelbach-West], Thales vigesimo quinto die ab aequinoctio [...].

**R22** (B2) Schol. in Arat. 172, p. 369.24

Θαλής [. . .] δύο αὐτὰς εἶπεν εἶναι, τὴν μὲν βόρειον τὴν δὲ νότιον.

## Zones of the Heavens (R23)

**R23** (A13c) Aët. 2.12.1 (Ps.-Plut.) [περὶ διαιρέσεως οὐ-ρανοῦ]

Θαλής [. . .] μεμερίσθαι τὴν τοῦ παντὸς οὐρανοῦ σφαῖραν εἰς κύκλους πέντε, οὕστινας προσαγορεύουσι ζώνας [. . .].

## Other Heavenly Bodies (R20–R22)

**R20** (< A1) Callimachus in Diogenes Laertius

Callimachus knows of him as the discoverer of the Great Bear, for he speaks in his *Iambs* as follows:

And he was said to have numbered the little stars Of the Great Bear, by means of which the Phoenicians navigate.

## R21 (A18) Pliny, Natural History

Hesiod (for an *Astronomy* is also extant under his name) reports that the morning setting of the Pleiades takes place at the autumnal equinox, Thales twenty-five days after the equinox [. . .].

## R22 (B2) Scholia on Aratus' Phaenomena

Thales [...] said that there are two of them [i.e. the Hyades], the northern one and the southern one.

## Zones of the Heavens (R23)

## **R23** (< A13c) Aëtius

Thales [...]: the sphere of the whole of heaven is divided into five circles, which they [i.e. besides Thales, Pythagoras and his disciples] call zones.

Position of the Earth (R24)

Division of the Year (R25)

**R25** (< A1) Diog. Laert. 1.27

τάς τε ὥρας τοῦ ἐνιαυτοῦ φασιν αὐτὸν εύρεῖν καὶ εἰς τριακοσίας έξήκοντα πέντε ἡμέρας διελεῖν.

Geometrical Discoveries (R26–R31)
Theorems and Demonstrations (R26–R30)

**R26** (A20) Procl. *In Eucl.* Prop. 15, theor. 8 (299.1–5 Friedlein)

τοῦτο τοίνυν τὸ θεώρημα δείκνυσιν, ὅτι δύο εὐθειῶν ἀλλήλας τεμνουσῶν αἱ κατὰ κορυφὴν γωνίαι ἴσαι εἰσίν, εὑρημένον μέν, ὡς φησὶν Εὔδημος [Frag. 135 Wehrli], ὑπὸ Θαλοῦ πρώτου [...].

**R27** (< A1) Diog. Laert. 1.24–25

παρά τε Αἰγυπτίων γεωμετρεῖν μαθόντα φησὶ Παμφίλη [Frag. 1 Cagnazzi] πρῶτον καταγράψαι κύκλου τὸ τρίγωνον ὀρθογώνιον, καὶ θῦσαι βοῦν. οἱ δὲ Πυθαγόραν φασίν, ὧν ἐστιν ᾿Απολλόδωρος ὁ λογιστικός.

# Position of the Earth (R24)

**R24** (A15) Aëtius

The followers of Thales: the earth is in the center [...].

## Division of the Year (R25)

# **R25** (< A1) Diogenes Laertius

They say that he was the one who discovered the seasons of the year and divided it into 365 days.

Geometrical Discoveries (R26–R31)
Theorems and Demonstrations (R26–R30)

**R26** (A20) Proclus, Commentary on the First Book of Euclid's Elements

Thus this theorem demonstrates that when two straight lines intersect one another, the corresponding angles are equal, a discovery, as Eudemus says, first made by Thales [...].

## **R27** (< A1) Diogenes Laertius

Pamphilê says that after he learned geometry from the Egyptians, he was the first to inscribe a right triangle in a circle, and that he sacrificed a bull [scil. in celebration]. Others, including Apollodorus the arithmetician, say that it was Pythagoras [cf. **PYTH. c D7a**].

**R28** (A20) Procl. *In Eucl.* Prop. 6, theor. 2 (250.20–251.2 Friedlein)

τῷ μὲν οὖν Θαλῆ τῷ παλαιῷ πολλῶν τε ἄλλων εὑρέσεως ἔνεκα καὶ τοῦδε τοῦ θεωρήματος χάρις. λέγεται γὰρ δὴ πρῶτος ἐκεῖνος ἐπιστῆσαι καὶ εἰπεῖν, ὡς ἄρα παντὸς ἰσοσκελοῦς αἱ πρὸς τῆ βάσει γωνίαι ἴσαι εἰσίν, ἀρχαικώτερον δὲ τὰς ἴσας ὁμοίας προσειρηκέναι.

**R29** (A20) Procl. *In Eucl*. Prop. 26, theor. 17 (352.14–18 Friedlein)

Εὔδημος δὲ ἐν ταῖς Γεωμετρικαῖς ἱστορίαις [Frag. 134 Wehrli] εἰς Θαλῆν τοῦτο ἀνάγει τὸ θεώρημα. τὴν γὰρ τῶν ἐν θαλάττη πλοίων ἀπόστασιν δι' οὖ τρόπου φασὶν αὐτὸν δεικνύναι τούτῳ προσχρῆσθαί φησιν ἀναγκαῖον.

**R30** (A20) Procl. *In Eucl*. Def. 17 (157.10–11 Friedlein) τὸ μὲν οὖν διχοτομεῖσθαι τὸν κύκλον ὑπὸ τῆς διαμέτρου πρῶτον Θαλῆν ἐκεῖνον ἀποδεῖξαί φασιν [. . .].

R28 (A20) Proclus, Commentary on the First Book of Euclid's Elements

We are indebted to ancient Thales for the discovery, among many other ones, in particular of the following theorem. For they say that he was the first to understand and to state that the angles at the base of every isosceles triangle are equal, even though he used the archaic expression "similar" for "equal."

<sup>1</sup> Diels infers from this passage that Proclus or Eudemus was making use of a mathematical text that was attributed to Thales.

**R29** (A20) Proclus, Commentary on the First Book of Euclid's Elements

Eudemus in his *History of Geometry* assigns this theorem [i.e. the equality of two triangles of which one side and the two neighboring angles are equal] to Thales. For he says that the method by which they say that he demonstrated the distance of ships on the sea requires that one make use of it.

**R30** (A20) Proclus, Commentary on the First Book of Euclid's Elements

They say that the celebrated Thales was the first to demonstrate that a circle is divided into two by its diameter [...].

The Measurement of the Pyramids (R31)

## **R31**

**a** (< A1) Diog. Laert. 1.27

ό δὲ Ἱερώνυμος [Frag. 40 Wehrli] καὶ ἐκμετρῆσαί φησων αὐτὸν τὰς πυραμίδας ἐκ τῆς σκιᾶς, παρατηρήσαντα ὅτε ἡμῖν ἰσομεγέθης ἐστίν.

**b** (A21) Plin. Nat. hist. 36.82

mensuram altitudinis earum deprehendere invenit Thales Milesius umbram metiendo qua hora par esse corpori solet.

c (A21) Plut. Sept. Sap. Conv. 2 147A

την βακτηρίαν στήσας έπὶ τῷ πέρατι της σκιᾶς ην ή πυραμὶς ἐποίει, γενομένων τῆ ἐπαφῆ της ἀκτινος δυείν τριγώνων ἔδειξας, ὃν ἡ σκιὰ πρὸς τὴν σκιὰν λόγον εἶχε, τὴν πυραμίδα πρὸς τὴν βακτηρίαν ἔχουσαν.

Aristotle's Reconstructions and Criticisms of Thales' Arguments (R32–R34)

## **R32**

a (< A12) Arist. Metaph. A3 983b25-984a3

 $[... = \mathbf{D3}]$  λαβών ἴσως τὴν ὑπόληψιν ταύτην ἐκ τοῦ

## The Measurement of the Pyramids (R31)

#### **R31**

## a (< A1) Hieronymus in Diogenes Laertius

Hieronymus says that he also measured [scil. the height of] the pyramids exactly on the basis of their shadow, by waiting for the moment when it [i.e. our shadow] has the same size as we do.

# **b** (A21) Pliny, Natural History

Thales of Miletus discovered how to take their [i.e. the pyramids'] measure by measuring their shadow at the hour when it is equal to [scil. the height of] the body.

# c (A21) Plutarch, The Dinner of the Seven Wise Men

You [i.e. Thales] placed a stick at the edge of the shadow which the pyramid made, and as two triangles were formed by contact with the sunbeam, you demonstrated that the pyramid is in the same ratio to the stick as the shadow of the one was to the shadow of the other.

# Aristotle's Reconstructions and Criticisms of Thales' Arguments (R32–R34)

## **R32**

- a (< A12) Aristotle, Metaphysics
- [. . .] Perhaps he had derived this assumption [cf. D3]

πάντων όραν τὴν τροφὴν ύγραν οὖσαν καὶ αὐτὸ τὸ θερμον ἐκ τούτου γιγνόμενον καὶ τούτω ζων (τὸ δ' ἐξ οδ γίγνεται, τοῦτ' ἐστὶν ἀρχὴ πάντων)—διά τε δὴ τοῦτο τὴν ὑπόληψιν λαβὼν ταύτην καὶ διὰ τὸ πάντων τὰ σπέρματα τὴν φύσιν ὑγρὰν ἔχειν τὸ δ' ὕδωρ ἀρχὴ της φύσεώς έστι τοῖς ύγροῖς. εἰσὶ δέ τινες οἳ καὶ τοὺς παμπαλαίους καὶ πολὺ πρὸ τῆς νῦν γενέσεως καὶ πρώτους θεολογήσαντας οὕτως οἴονται περὶ τῆς φύσεως ὑπολαβεῖν. 'Ωκεανόν τε γὰρ καὶ Τηθὺν ἐποίησαν της γενέσεως πατέρας, καὶ τὸν ὅρκον τῶν θεῶν ύδωρ, την καλουμένην ύπ' αὐτῶν Στύγα τῶν ποιητῶν.1 τιμιώτατον μὲν γὰρ τὸ πρεσβύτατον, ὅρκος δὲ τὸ τιμιώτατόν ἐστιν. εἰ μὲν οὖν ἀρχαία τις αὕτη καὶ παλαιὰ τετύχηκεν οὖσα περὶ τῆς φύσεως δόξα, τάχ' αν άδηλον είη, Θαλής μέντοι λέγεται ούτως αποφήνασθαι περί της πρώτης αἰτίας.

 $1 \tau \hat{\omega} \nu \pi o i \eta \tau \hat{\omega} \nu$  secl. Christ

b (< Th 191 Wöhrle) Alex. In Metaph. A3, p. 26.16–18 εἰκότως τὸ "λέγεται οὕτως ἀποφήνασθαι"· οὐδὲν γὰρ προφέρεται αὐτοῦ σύγγραμμα, ἐξ οὧ τις τὸ βέβαιον ἕξει τοῦ ταῦτα λέγεσθαι τοῦτον τὸν τρόπον ὑπ' αὐτοῦ.

from seeing that what nourishes all things is moist and that what is warm itself comes from this [i.e. water] and lives because of it (and what things come about from is the principle of all things)—it is for this reason then that he had this idea, and also from the fact that the seed of all things has a moist nature; and for things that are moist, water is the principle of their nature. But there are some people who think that those who spoke about the gods in ancient times, long before the present generation, and indeed were the first to do so, had formed the same conception about nature: for they made Ocean and Tethys the parents of becoming and the oath of the gods water, what they, being poets, called Styx [cf. COSM. T6, T7]; for what is most ancient is most honorable, and an oath is what is most honorable. Well, whether this really is a primeval and ancient view about nature, might well be unclear; however, at least as far as Thales is concerned, people say that he expressed himself in this way about the first cause.

**b** (≠ DK) Alexander of Aphrodisias, Commentary on Aristotle's Metaphysics

The phrase "people say that he expressed himself in this way" is appropriate; for no treatise by him is cited on the basis of which one could be certain that this was said by him in this way.

## **R33**

**a** (< A14) Arist. Cael. 2.13 294a32–33

[. . . = **D7**] ὥσπερ οὐ τὸν αὐτὸν λόγον ὄντα περὶ τῆς γῆς καὶ τοῦ ὕδατος τοῦ ὀχοῦντος τὴν γῆν.

**b** (< A14) Simpl. *In Cael*. 522.16–18

[...] πρὸς ταύτην δὲ τὴν δόξαν ὁ ᾿Αριστοτέλης ἀντιλέγει μᾶλλον ἴσως ἐπικρατοῦσαν διὰ τὸ καὶ παρ' Αἰγυπτίοις οὕτως ἐν μύθου σχήματι λέγεσθαι καὶ τὸν Θαλῆν ἴσως ἐκεῖθεν τὸν λόγον κεκομικέναι.

## **R34**

**a** (A22) Arist. An. 1.5 411a7–8

καὶ ἐν τῷ ὅλῳ δέ τινες αὐτὴν μεμεῖχθαί φασιν, ὅθεν ἴσως καὶ Θαλῆς ῷήθη πάντα πλήρη θεῶν εἶναι [D10].

**b** (< A1) Diog. Laert. 1.27

[. . .] τον κόσμον ἔμψυχον καὶ δαιμόνων πλήρη.

Assimilations to Later Doctrines (R35-R39)

**R35** (A23) Aët. 1.7.11 (Stob.)  $[\pi \epsilon \rho \hat{\imath} \theta \epsilon o \hat{\imath}]$ 

Θαλης νουν του κόσμου τον θεόν, το δε παν εμψυχον

#### **R33**

a (< A14) Aristotle, On the Heavens

[...] as though the explanation given for the earth [cf. **D7**] did not apply as well to the water that bears the earth.

**b** (< A14) Simplicius, Commentary on Aristotle's On the Heavens

Aristotle contradicts this opinion, which perhaps is more prevalent because it is also stated among the Egyptians in the form of a myth and because Thales perhaps brought back this explanation from there.

#### **R34**

a (A22) Aristotle, On the Soul

Some people say that it [i.e. the soul] is mixed in with the whole, which is perhaps also the reason why Thales thought that all things are full of gods [cf. **D10**].

**b** (< A1) Diogenes Laertius

[... he thought] that the universe is animate and full of divinities.

Assimilations to Later Doctrines (R35–R39)

**R35** (A23) Aëtius

Thales: god is the intelligence of the world, the universe

αμα καὶ δαιμόνων πληρες· διήκειν δὲ καὶ διὰ τοῦ στοιχειώδους ύγροῦ δύναμιν θείαν κινητικὴν αὐτοῦ.

**R36** (A22a) Aët. 4.2.1 (Ps.-Plut.)  $[\pi \epsilon \rho \hat{\iota} \psi \nu \chi \hat{\eta}_{\varsigma}]$ 

Θαλης ἀπεφήνατο πρώτος την ψυχην φύσιν ἀεικίνη-τον ἢ αὐτοκίνητον.

## **R37** (< A1) Diog. Laert. 1.24

ένιοι δὲ καὶ αὐτὸν πρῶτον εἰπεῖν φασιν ἀθανάτους τὰς ψυχάς· ὧν ἐστι Χοιρίλος ὁ ποιητής [SH 331] [. . . = **D11b**].

R38 (A23) Cic. Nat. deor. 1.10.25

Thales enim Milesius, qui primus de talibus rebus quaesivit, aquam dixit esse initium rerum: deum autem, eam mentem, quae ex aqua cuncta fingeret.

**R39** (< Th 210 Wöhrle) (Ps.-?) Hippol. Ref. 1.1

[... = **D4**] καὶ τὰ πάντα φέρεσθαί τε καὶ ῥεῖν τἢ τοῦ πρώτου ἀρχηγοῦ τῆς γενέσεως αὐτῶν φύσει συμφερόμενα. θεὸν δὲ τοῦτ' εἶναι, τὸ μήτε ἀρχὴν μήτε τελευτὴν ἔχον.

is animated and at the same time full of divinities; and the divine power passes through the elementary moisture and moves it.

## R36 (A22a) Aëtius

Thales was the first to state that the soul is a nature which is always in motion or which moves itself.<sup>1</sup>

<sup>1</sup> The disjunction is connected with a celebrated textual problem in Plato, *Phaedrus* 245c.

## **R37** (< A1) Diogenes Laertius

Some people also say that he was the first to say that souls are immortal; one of them is Choerilus the poet [. . .].

# R38 (A23) Cicero, On the Nature of the Gods

For Thales of Miletus, who was the first to investigate these matters, said that water is the beginning of things, but that god is the intelligence capable of making all things out of water.

**R39** (≠ DK) (Ps.-?) Hippolytus, Refutation of All Heresies

[...] And all things are borne along and flow, carried along by the nature of the first principle (*arkhêgos*) of their becoming. This, having neither beginning nor ending, is god.

Gnostic and Christian Interpretations (R40–R43)

**R40** (< Th 145 Wöhrle) Iren. Adv. haer. 2.14.2

Thales quidem Milesius universorum generationem et initium aquam dixit esse: idem autem est dicere aquam et Bythum.

**R41** (Th 213 Wöhrle) (Ps.-?) Hippol. Ref. 5.9.13

είναι δὲ τὸν ὄφιν λέγουσιν οὖτοι τὴν ὑγρὰν οὐσίαν, καθάπερ ὁ Μιλήσιος, καὶ μηδὲν δύνασθαι τῶν ὄντων ὅλως, ἀθανάτων ἢ θνητῶν, ἐμψύχων¹ ἢ ἀψύχων, συνεστηκέναι χωρὶς αὐτοῦ.

 $1 \tau \hat{\omega} \nu$  ante  $\dot{\epsilon} \mu \psi \dot{\nu} \chi \omega \nu$  del. Cruice

## R42 (< Th 229 Wöhrle) Min. Fel. Octav. 19.4

sit Thales Milesius omnium primus, qui primus omnium de caelestibus disputavit. idem Milesius Thales rerum initium aquam dixit, deum autem eam mentem, quae ex aqua cuncta formaverit. esto¹ altior et sublimior aquae et spiritus ratio, quam ut ab homine potuerit inveniri, a Deo traditum; vides philosophi principalis nobiscum penitus opinionem consonare.

1 eo ms., corr. Vahlen

**R43** (< 7 A5) Appon. 5.22–23 (ad *Cn.* 3:5)

in priore enim 'filiarum adiuratione,' in 'caprearum et

Gnostic and Christian Interpretations (R40–R43)

**R40** (≠ DK) Irenaeus, Against Heresies

Thales of Miletus said that water is the source and beginning of all things; but it is the same thing to say "water" and "Abyss" (*Buthos*)."<sup>1</sup>

<sup>1</sup> According to some Gnostics, Bythos is the abyss out of which all things come.

**R41** (≠ DK) (Ps.-?) Hippolytus, Refutation of All Heresies

These people [i.e. some Gnostics] say that the serpent is the moist substance, just like the Milesian [i.e. Thales], and that nothing at all of the things that are, immortal or mortal ones, animate or inanimate ones, is capable of being formed without it.

## **R42** (≠ DK) Minucius Felix, Octavius

Let Thales of Miletus be first of all, he who was the first of all to discuss celestial phenomena. This same Thales of Miletus said that water is the beginning of things, but that god is the mind (mens) that formed all things out of water. This theory of water and spirit (spiritus), too lofty and sublime to have been invented by a human being, may well have been transmitted by God. You see that the opinion of the founder of philosophy entirely agrees with ours.

**R43** (< 7 A5) Apponius, Commentary on the Song of Songs

For we said about the earlier 'adjuration of the daughters'

cervorum' personas thalesianae et ferecidensis philosophiae intellegi diximus [= PHER. R29]. [. . .] [23] de quibus Thales nomine initium omnium rerum aquam in suo esse dogmate pronuntiavit, et inde omnia facta subsistere ab inviso et magno; causam vero motus aquae spiritum insidentem confirmat, simulque geometricam artem perspicaci sensu prior invenit, per quam suspicatus est unum rerum omnium creatorem [. . . = PHER. R16].

# A Pseudepigraphic Text (R44)

## **R44** (B3) Ps.-Gal. In Hipp. Hum. 1.1

Θαλής μὲν εἴπερ καὶ ἐκ τοῦ ὕδατός φησι συνεστάναι πάντα, ἀλλ' ὅμως καὶ τοῦτο βούλεται. ἄμεινον δὲ καὶ αὐτοῦ τὴν ῥῆσιν προσθεῖναι ἐκ τοῦ δευτέρου Περὶ τῶν ἀρχῶν ἔχουσαν ὧδέ πως τὰ μὲν οὖν πολυθρύλητα τέτταρα, ὧν τὸ πρῶτον εἶναι ὕδωρ φαμὲν καὶ ὡσανεὶ μόνον στοιχεῖον τίθεμεν, πρὸς σύγκρισίν τε καὶ πήγνυσιν καὶ σύστασιν τῶν ἐγκοσμίων πρὸς ἄλληλα συγκεράννυται. πῶς δέ, ἤδη λέλεκται ἡμῖν ἐν τῷ πρώτῳ.

that 'the roes and stags' are to be understood as the representatives of the philosophy of Thales and Pherecydes.¹ [...] [23] Among these philosophers [i.e. the pure ones who can be compared to roes and stags], the one named Thales declared in his doctrine that water is the origin of all things, and that everything that has been made from this subsists because of a great invisible being, and he states that the cause of the movement of the water is the spirit that dwells within it. At the same time, it was he who by his intelligence was the first to discover the science of geometry, and this permitted him to surmise that there is only one creator of all things [cf. **PHER. R16, R29**].

<sup>1</sup> The reference seems to be to his commentary (4.1) on *Cn*. 2:7 (where in fact he does not name Thales or Pherecydes, but the Platonists and the Stoics).

# A Pseudepigraphic Text (R44)

**R44** (B3) Ps.-Galen, Commentary on Hippocrates' On Humors

Although Thales says that all things are constituted out of water, nonetheless he also wants this [i.e. that the elements are transformed into one another]. It is better to cite his own words from Book 2 of *On the Principles*, which are as follows: "Therefore the celebrated four, of which we say that the first is water and posit it as being as it were the only element, mix with one another for the combination, solidification, and composition of the things of this world. How this happens we have already said in Book 1."