

## Archytas on Seeking and Learning: A Textual Issue

In his surviving Fragments 1 and 3 (D-K, 47[35]), Archytas of Tarentum advocates the priority of knowledge gained μαθηματικῶς as being the most informative and fruitful knowledge. This paper addresses a textual issue in Fragment 3 that is significant for Archytas' understanding of the origin of knowledge. The issue is the relations among a person learning (μαθόντα), seeking (ζατοῦντα), and finding out (ἐξευρὲν). He says that one becomes knowledgeable (ἐπιστάμονα) of things one did not know either by learning from another or finding out for oneself. The passage reads as follows:

For it is necessary that one become knowledgeable of the things one did not know, either by learning from another or finding out for oneself. Learning is from another and belongs to the other, while finding out is through oneself and belongs to oneself.

Without seeking, finding out is rare as there is no route to it, while for the one seeking, there is a way through and it is easy. But if one does not know, it is impossible to seek. There has been disagreement about how to interpret the last line of the fragment, an alternate reading being, "But if one does not know how to seek, it is impossible [to find out]." But how can finding out be *rare* without seeking, if it is *impossible* without knowing how to seek?

This paper explores answers given to this textual inconsistency. Some read, "It is impossible to seek what one does not know (ἐπιστάμενον)" (Iamblichus, *d. comm. Math. Sc.* 11 p. 44, 10). This reading, reminiscent of Meno's paradox, is unlikely to be Archytas' meaning, given his confidence just stated that seeking leads to finding.

Some emend the line to include a reference to calculation (λογίζεσθαι), since the Iamblichan version of the fragment is followed by a statement of the value of calculation for reconciliation among political factions (Huffman 2005, 182). Since the fragment is quoted by Stobaeus in a very different context, this emendation cannot be considered a settled matter. Yet,

an alternate reading, “It is impossible to seek, without knowing how” (D-K, 437) presents a double use of ζητεῖν, which it has been argued is unlikely on grounds of grammar and usage.

This paper suggests a reading that takes the last line as it stands in the Greek, regardless of context. This reading understands the line to read, “But if one does not know how, it is impossible to seek.” The reading comes close to drawing the fire trained upon the double ζητεῖν reading. This reading, however, draws on the pre-philosophical meaning of ἐπιστάσθαι as “knowing how” and exploits the kinship in sense of ἐπιστήμη to ἐπίσθημι, ‘fix one’s mind upon.’ Archytas’ meaning is that finding the superior sort of answer to a problem, the mathematical one, requires a particular sort of attention, which some will never master for themselves. These others, however, can learn. The passage thus reflects the Pythagorean division of *acousmatikoi* and *mathêmatikoi*, and suggests the origin of the plural *mathêmata* in the learning of a knowledge technique originated by another.

The passage is striking in highlighting the fascination of mathematical knowledge as distinctive and fundamental and the lack at this time of a competing narrative natural philosophy. It also locates the origin of knowledge in mathematical reasoning and, on a human level, in a capacity or talent for the mathematical mode of reasoning.

#### Bibliography

Diels, Hermann, and Walther Kranz, eds. *Die Fragmente der Vorsokratiker: griechisch und deutsch*. 3 vols. Berlin: Weidmann, 1956, vol. 1.

Huffman, Carl. *Archytas of Tarentum: Pythagorean, Mathematician, and Philosopher King* (Cambridge: Cambridge University Press, 2005).