Editorial

Aristotle scores in congenital heart surgery

This issue of the *European Journal of Cardio-thoracic Surgery* (www.ejcts.org) features the new Aristotle scores for complexity of congenital heart surgery procedures [1]. The 'Aristotle Work Group' united delegates from 50 Centers in 23 nations, who realized under the leadership of Francois Lacour-Gayet, a titan task as your editor had the opportunity to witness during some of the numerous sessions, which had been necessary. The term 'titan' applies here not only because Aristotle was a Greek philosopher and therefore wording with reference to the Greek mythology (Titans, also known as the elder Greek gods, with tremendous powers were later overthrown by the younger Olympians. The ruler of the Titans was Cronos who was de-troned by his son Zeus) seems appropriate, but because the project required indeed a lot of efforts, and this from a large group of contributors. Of course part of the groundwork had been done before, and some of the actors of this endeavor had also been involved in the previous effort [2], which is the establishment of the nomenclature.

As I see it, the development of a classification is very much in the spirit of Aristotle himself. Aristotle was born in 384 BC in Stagira (east of Chalkidike, Greece). His father, Nikomachos, was the personal doctor to the king of Macedonia, Amyntas III (II?). From 367 BC until the death of Plato (348/347 BC), Aristotle was a member of Plato's academia. Because of political pressures he had to leave Athens and accepted the invitation of Hermias to Assos, before he went to Mytilene where he received in 343/342 BC a call from the King Philip II to join the court of Macedonia as an educator for his 14-year-old son Alexander. The consecutive political changes allowed Aristotle to return to Athens in 335/334 BC where he started the new Peripatetic school (the name peripatetic is derived from the covered walk [Greek: peripatos], where he and his disciples developed their main activities [3]). After the death of Alexander in 323 BC, Aristotle had to leave Athens in 322 BC, and went to Chalkis, where he died the following year from gastric disease.

During his active life, Aristotle had not only founded a school with a major library but he also collected zoological and botanical specimens (he had secured special funding from Alexander the Great for this purpose). His fame however is based on his philosophical works [4], which include in his so-called logical-works the well-known 'categories', namely (1) substance (e.g. horse, man), (2) quantity (e.g. two or three feet long), (3) quality (e.g. white, trained), (4) relation (e.g. double, half, bigger), (5) place (e.g. on the market, at the lyceum), (6) time (e.g. time, last year), (7) position (e.g. sitting, lying), (8) state (e.g. armed, hungry), (9) action (e.g. cutting, burning), and (10) passion (being cut, being burned).

Theophrastos from Lesbos (372–287 BC) who had worked with Aristotle over a long period became his friend, successor and head of the peripatetic school for 35 years. Among many other works about almost all topics of human knowledge, he made the first scientific approach to botany, listed already over 500 varieties, and produced the famous 'Ethical Characters'—the delineation of moral types, which had an enormous impact when it was translated into French by La Bruyère in 1688. While following Aristotle's research program, Theophrastus was also prepared to question and disagree with the aspects of Aristotelian natural philosophy [5].

So much about the origin of logic, cooperative research, its funding, categories, classification, characters, questions, and disagreement. There is not much philosophy needed in order to admit that changes will occur sooner or later, not only for the basic nomenclature of congenital heart defects, but also for the procedures recommended for repair, the means available to realize them [6], and the way the results are perceived by the society (the latter not even being uniform over the globe by now). Hence, a mechanism has to be developed that allows for modification of the Aristotle scores for complexity of congenital heart surgery procedures in a reliable and transparent fashion. The latter is of prime importance to achieve and maintain global acceptance, or more simply, to keep the Aristotle scores for complexity of congenital heart surgery procedures alive and well…

References

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