

## Scrutiny of cranial nerves' anatomy from the perspective of Razi and Ibn Sina comparing to the modern medicine

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### Abstract:

**Background and Purpose:** The achievements of modern medical schools are linked to the past schools of this science. Understanding the basic sciences of these schools is essential for accurate understanding of them. Understanding the anatomy of the nerves as a part of these basic sciences in traditional Persian medicine and its role in the occurrence and treatment of the diseases is of great importance. In this study, we scrutinized the anatomy of the cranial nerves from Razi and Ibn Sina's point of view and compared it with *Gray's Anatomy*.

**Methods and Materials:** In this comparative study, we reviewed the anatomy of the cerebral nerves in terms of their number and function in *Al-Mansouri fi al-Tibb* and *Al-Qanun fi al-Tibb*, two important books of the Islamic civilization, and compared them with the book of *Gray's Anatomy*.

**Results:** From the viewpoint of modern medicine including *Grey's Anatomy*, the number of cranial nerves is twelve pairs, but in the abovementioned books, they are seven pairs. The primary and terminal nerves of the brain are almost similar in terms of naming and function to modern medicine. In the case of the Middle Brain Nerves, while the function of these nerves is similar to modern medicine, but different parts of one nerve may match different parts of several nerve pairs.

**Conclusion:** The reason for discrepancy with the new anatomy is the difference in the number of cranial nerves which is due to the lack of naming, and naming of some neural branches as one branch due to convergence of exit nerves. However, in describing the function of these nerves, almost all branches have been addressed. Ibn Sina also mentions more detail comparing to Razi's *Al-Mansouri* book on the cranial nerves.

**Keywords:** Cranial Nerves, Traditional Persian Medicine, History of Medicine, Anatomy

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