MAGISTER MAURUS THE "GALENIENUS SALERNITANUS" OF THE MEDICAL SCHOOL OF SALERNO

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INTRODUCTION AND AIMS

Magister Maurus of Salerno (ca 1130-1214 A.D.), hailing from Calabria of Southern Italy,

taught Medicine in the renowned "Scuola Medica Salernitana" during the period of its flourishing. The aim of the present study was to highlight his significant contribution in the medical perception of uroscopy.



METHODS

We studied Magister Maurus treatise "Tractatus de urinis" and relevant bibliography.

RESULTS

Magister Maurus wrote treatises about the urinary tract diseases based in uroscopy. His work includes "De symtomatibus urinarum", "Urinae abbreviatae", possibly "Sinthomata magistri Mauri" and the most important and renowned "Tractatus de urinis" or "Regulae urinarum". The latter influenced strongly Gilles de Corbeil, who wrote the Carmina de Urinarum Judiciis, a composition in verse that dominated European medical practice for the next five to six centuries. "Tractatus de urinis" collected all the uronephrological knowledge of that era. There was clear distinction between the *color* and the *substantia* of the urine and it was thought that the appropriate combination of them unmasked the disease. The *color* of the urine, correlating with the humor theory (four temperaments: choleric, melancholic, phlegmatic and sanguine), was distinguished as white (alba) or red (rubea), while the substantia was classified as dense (pinguedo), light (tenuitas) or medium (mediocritas) and influenced the later uroscopic approach of the alchemists of the Renaissance.

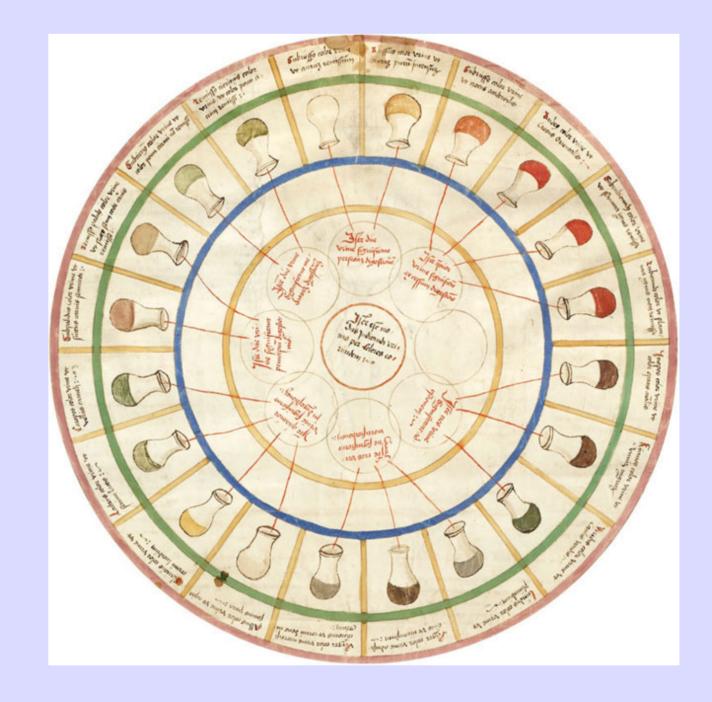
The Medical School of Salerno in a miniature of Avicenna's "Canon Of Medicine"



Maurus' novelty was his unique approach regarding the layering of turbidity of urine when examined in amida (a glass bottle used in uroscopy). He correlated the strata of urine with particular zones of the human body. When urine was turbid in the upper stratum of the sediment, it was thought that illness affected the head; if it was turbid in the second intermediate stratum, the parts affected were the heart and the lungs; the third stratum was correlated to the gastrointestinal system, whereas turbidity in the lower stratum implied urogenital diseases. Moreover, it should be noted that, although there isn't any specific reference on the kidney examination, anatomy and physiopathology itself, symptoms of various diseases that affected primarily the kidneys were mentioned thoroughly. Magister Maurus surpassed conventional



Amida (uroscopy flask)



The Urine Wheel, from Epiphanie Medicorum by Ullrich Pinder

CONCLUSIONS

Maurus of Salerno was undoubtedly one of the most important scientific figures of the Mediterranean world during 12th century and he was

widely respected, as it is depicted by the characteristic names, like "optimus physicus" and "Galenienus Salernitanus". Based mainly on the

Greek-Latin medical tradition, as well as in Arabian works, he collected, combined, codified and developed further the knowledge about

uroscopy in his era, setting that way the foundations of monastic uroscopy in the Medical School of Salerno and having a major impact on the development of Western medicine.

References/Bibliography:

[•] Saffron MH and Maurus of Salerno. "Maurus of Salerno: Twelfth-Century 'Optimus Physicus'. With His Commentary on the Prognostics of Hippocrates." Transactions of the American Philosophical Society, vol. 62, no. 1, 1972, pp. 1–104.



[•] Medieval Science, Technology and Medicine: An Encyclopedia. Editors: Thomas F. Glick, Steven J. Livesey, Faith Wallis. Published in 2005 by Routledge. New York, London. Page 334.

[•] Liappa S., Karkalousos P., "Uroscopy and its development", Applied clinical microbiology and laboratory diagnosis, October 2008; 13(4): 255-264.

[•] Ziegler J. "La scuola medica Salernitana. Gli autori e i testi edited by Danielle Jacquart and Agostino Paravicini Bagliani.", Institute for Research in Classical Philosophy and Science. Aestimatio : Critical Reviews in the History of Science, Vol 5, Pp 81-92 (2008).

[•] Oldoni M. "Monastic nephrology in the school of Salerno and in an unpublished treatise in middlelatin and Italian volgare of the manuscript 2Qq C63 in the public library of Palermo." J NEPHROL 2004; 17: 334-336.