Summer 2008

Observationes Medicae, 1685

Charles T. Ambrose
University of Kentucky, cambros@uky.edu

Follow this and additional works at: https://uknowledge.uky.edu/microbio_facpub
Part of the History of Science, Technology, and Medicine Commons, and the Medical Humanities Commons

Repository Citation
Ambrose, Charles T., "Observationes Medicae, 1685" (2008). Microbiology, Immunology, and Molecular Genetics Faculty Publications. 41.
https://uknowledge.uky.edu/microbio_facpub/41

This Article is brought to you for free and open access by the Microbiology, Immunology, and Molecular Genetics at UKnowledge. It has been accepted for inclusion in Microbiology, Immunology, and Molecular Genetics Faculty Publications by an authorized administrator of UKnowledge. For more information, please contact UKnowledge@lsv.uky.edu.
Nicolaas Tulp's popular immortality rests in a 1632 painting of him by Rembrandt entitled *The Anatomy Lesson*. Here Tulp is sitting in a chair while demonstrating tendons in the dissected left arm of an executed criminal. Grouped around the autopsy table are seven spectators, all noted public figures in Amsterdam. Their names are listed in a sheet held by one observer; none had a medical degree. The 23-year-old subject being anatomized was Adriaan Adriaans (Het Kint, or The Kid), a case-maker “hanged for insolence” (assault and battery) a day before the dissection in January 1632. Rembrandt’s depiction of the tendons is faulty and was probably copied from a drawing. Tendons on the back of the right hand (extensors digitorum) are transposed (incorrectly) to the palm of the left hand.

Rembrandt's 1632 painting *The Anatomy Lesson* established the artist's reputation and immortalized Nicolaas Tulp. Photo courtesy of Royal Cabinet of Paintings Mauritshuis, The Hague.

Nevertheless, the painting was an instant success in Amsterdam and established the reputation of Rembrandt, then age 26. Before *The Anatomy Lesson*, he had painted only three portraits besides those of himself and his family; afterwards, between 1632 and 1634, he received 40 commissions.

Tulp (1593-1674) was born Claes Pieter, whose Latin form is Nicolaus Petreus. Over the years, as his local fame increased, the name Tulp became attached to him because his paternal house had earlier been an auction place for tulips. He trained at the University of Leyden Medical School and practiced surgery along with general medicine in Amsterdam. In 1622, he was elected one of 36 city counselors. Between 1645 and 1672, he served four times as mayor and eight times as city treasurer. All the while he maintained a large, busy practice and often offered his medical services without charge. An artist whose daughter he treated grati later painted Tulp pointing to a burning candle, beneath which is a caption reading *Aliis inserviendo consumer* (I am consumed in serving others).

Tulp was appointed praetor in anatomy for the Surgeons' Guild and served in this position from 1629-53. Yearly public demonstrations of human anatomy in Amsterdam had begun around 1550 with the body of a criminal “punished with the rope.” Dissections were held in mid-winter. Guild members were obliged to attend and fined for being absent. City officials and persons of note, including ladies, were invited, but children were excluded. Talking and laughing were prohibited; decent, serious questions were allowed. Spectators were admonished not to steal parts of the cadaver as they were passed around. The entrance fees usually added up to 200 florins, which paid the hangman handsomely and defrayed the cost of the event and of a banquet afterwards.

Tulp’s only book, *Observationes Medicae* (Medical Observations), was written in 1637 as a guide for his son, who had recently graduated from the Leyden Medical School. Of the six editions (1641-1737), the rarest is the fourth edition, 1685, which is in the Horine section of Transylvania University’s Special Collections. It contains an excellent portrait of Tulp. In the early seventeenth century, medical books were being written in the vernacular, but Tulp wrote his text in Latin to prevent the general public from reading it and possibly treating themselves unwisely.
The frontispiece illustrates several of Tulp's medical interests. At the top is depicted a seated man with a figure crouched behind him. Nearby are a bed, a urine pot, and a mallet. I surmise that the man is seated on an open bottom chair and that the crouched figure is seeking per anum to dislodge a kidney stone stuck in the patient's bladder or urethra. Tulp described three ultimate means of removing such a stone: by knife, hook, or suction. To the left on the title page is a standing male with a greatly swollen abdomen, from which spurts a thin stream. This figure may have ascites (abdominal fluid from dropsy, or heart failure) and have undergone a paracentesis to release the fluid. To the right is a female figure whose abdomen has been opened to reveal enlarged symmetrical masses, which Tulp labeled in a later figure as "hydras cornuum uteri." Finally, at the bottom of the title page is a seated chimpanzee with a quizzical, perhaps happy expression. Elsewhere in the text Tulp identified it as *Homo sylvestris, Orang-outang* (man of the woods, orangutan) and discussed its human-like behavior in a section titled *Satyrus Indicus*.

Transylvania's 1685 edition contains 229 observations, several being premier reports of medical findings. Tulp was among the first to describe in man the ileocecal value ("valvula Tulpii") and the *vasa lactea* (vessels draining lymph from the small intestine to the thoracic duct), the fish tape worm (*Diphyllobothrium latum*), and beriberi (a deficiency of thiamin, i.e., vitamin B-1). Tulp believed in blood-letting but opposed the use of tobacco. He provided many fascinating case histories, including one of hysterical aphasia cured by lightning. Another case report relevant to this essay involved a distinguished painter ("insignis Pictor") under the delusion that his bones were softening ("molia"), thus putting him in danger of buckling under his weight. All winter long he kept to his bed ("kniemen in lecto"). Over the course of six days, using suggestions and cathartics, Tulp convinced the patient of his delusion. Some scholars now believe the painter may have been Rembrandt.

Charles T. Ambrose is a Professor in the Department of Microbiology, Immunology, and Molecular Genetics at the University of Kentucky College of Medicine. His library of 400 medical texts from the sixteenth and seventeenth centuries has formed the basis for numerous publications and presentations on medical history.