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## **BIOGRAPHY**

### **MATHIEU JOSEPH BONAVENTURE ORFILA(1787-1853)**



Mathieu Joseph Bonaventure Orfila(1787-1853), often called the “Father of Toxicology,” was the first great 19<sup>th</sup>–Century exponent of Forensic Medicine. Orfila worked to make chemical analysis a routine part of Forensic Medicine, he helped to develop tests for the presence of blood in a Forensic context and is credited as one of the first people to use a microscope to assess blood and semen stains. He also worked to improve the quality of medical training to the students.

Born as a Spanish subject, on the island of Minorca, before going to study in Paris, Orfila first studied medicine in Valencia and Barcelona,. His first major work, published in 1812. In 1816, he became royal physician to the French monarch Louis XVIII. In 1817 he became chemistry professor at the Athenee of Paris, and published *Elements de chimie medicale*, on medical applications of chemistry. In 1818 he published In 1819 he became a French citizen and was appointed professor of medical jurisprudence. Four years later, he was made professor of medical chemistry.

He became dean of the faculty of Medicine in 1830 and reorganized the medical school, raised educational requirements for admission, and instituted more rigorous examination procedures. He also helped to establish hospitals and museums.

During his long career, Orfila was called to act as a medical expert in widely publicized criminal cases, Exacting in his methods, Orfila argued that argued that arsenic in the soil around graves could be drawn the body and be mistaken for poisoning. He conducted many studies and insisted that testing of soil be part of the procedure in all exhumation cases. He was removed from his post as dean during the 1848 revolution, a commission was set up to investigate illegal or irregular acts during his tenure, but found none. By 1851, he was rehabilitated and elected president of the Academy of Medicine.

## **HISTORY OF FORENSIC MEDICINE & TOXICOLOGY**

- Evidence of finger prints in early paintings & rock carvings made by prehistoric humans.
- Prehistoric writing of a hand with ridge patterns is discovered in Nova Scotia.
- In ancient Babylon, fingerprints on clay tablets are used for business transactions.
- In ancient china, thumb prints are found on clay seals. > 700BC
- ERASISTRATUS, an ancient Greek physician, observes that his patients Pulse rate increase when they tell him lies. This is supposed to be the first lie detection test.250- 44BC.
- Roman physician ANTISTIUS examines the body of Julius Caesar after his assassination and finds that out of 23 stab wounds, one wound on the chest was fatal - 0000 BC.
- Arsenic oxide is first produced commercially as a result of refining ore in iron and lead mining. It will become the poison of choice for many over the succeeding centuries especially black widows and bluebeards, often called “inheritance powder”- 1000 AD.
- QUINTILIAN, an attorney in the Roman courts, shows that bloody palm prints are meant to frame a blind man of his mother's murder – 1100 - 1200 AD.
- The Chinese book Hsi Duan Yu (the washing away of wrong), describes how to distinguish drowning from strangulation, the first recorded application medical knowledge to the solution of crime. The book becomes an official text for coroners - 1248 AD.
- The great Italian surgeon Hugh of LUCCA, famous for his anticipation of antiseptic treatment of wounds, takes an oath as medicolegal expert of the city of Bologna - 1249 AD.
- Bartolomeo da VARIGNANA of bologna performs a medicolegal autopsy in case of suspected murder of a nobleman called AZZOLINO - 1400 - 1500 AD.
- Constitution Bambergensis Criminalis appears in the diocese of the Bishop of Bamberg. This book emphasizes the usefulness of physicians in legal cases involving infanticide and bodily injury - 1507 AD.