

**ROMANTIC LITERATURE AND NATURAL PHILOSOPHY, SCIENCE,
AND MEDICINE: MARY SHELLEY'S *FRANKENSTEIN***

An Undergraduate Research Scholars Thesis

by

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ABSTRACT

Romantic Literature and Natural Philosophy, Science, and Medicine: Mary Shelley's
Frankenstein

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Literature Review

Mary Shelley's novel places important emphasis on three major subjects, experimentation, medicine, and ethics. The analysis of Victor Frankenstein through a historical and cultural lens provides necessary framework in which a reader can improve their comprehension of the novel. Shelley's allusion to these topics result from her own historical standpoint, as she identifies the Age of Enlightenment within Romantic Era.

Thesis Statement

Mary Shelley writes of a scientific horror, replacing the traditional paranormal Gothic with the social anxiety of death. Though a product of the imagination, the novel reflects the unusual interests of eighteenth and nineteenth century physicians who explored galvanic experimentation. While originally considered an act of divinity, Enlightenment theorists and scientists sought to cure mortality in pursuit of raising the dead, attempting to replace God through human autonomy. *Frankenstein* tragically reflects these futile endeavors as characterized by Victor's ultimate failure to obtain divine knowledge and assume the role of an omnipotent creator.

Theoretical Framework

I wish to frame my research around the theoretical inquiries Mary Shelley exemplifies in her novel, *Frankenstein*. This thesis will provide necessary literary framework exploring the Age of Enlightenment to provide a greater understanding of the historical context, specifically focusing on the history of experimentation, medicine, and ethics.

Project Description

I will write three small chapters with the objective of showing how a reasonable understanding of eighteenth century natural philosophy, medicine, and ethics illuminate the ethical and scientific framework highlighted in *Frankenstein*. The objective of this project is to serve as a guide, familiarizing the reader with the major topics Mary Shelley features in her novel, *Frankenstein*.

INTRODUCTION

The revolutionary novel *Frankenstein or the Modern Prometheus*, penned by the inventive Mary Shelley (1797-1851), explores the scientific pursuit of the extermination of death based on theoretical notions and philosophies of the eighteenth century. Shelley crafted a creature of revolting nature and proposed a grim relationship between creator and creation, revealing a disastrous experimental failure. Victor Frankenstein's experimentations imitate similar scientific inquiries of the Romantic era, reflecting the rising interest in the boundaries between life and death. This exaggerated text ultimately defies death, resulting in devastating catastrophe, artistically illustrating these gruesome pursuits, concluding that mankind cannot usurp the role of God.

CHAPTER I

MEDICAL HISTORY, NATURAL PHILOSOPHY AND ETHICS

The Age of Enlightenment promoted rationality and reason as scientists and philosophers sought the discovery of natural law, to further the progression of knowledge, technological and medicinal advancement, and the natural rights and morals of mankind. Their desire for an existence excluding religious ideology propelled logical philosophy, commencing a mathematical and scientific revolution. *Frankenstein* is a product of enlightened thinking, a true reflection of logical examination, as the protagonist, enticed by unachievable knowledge, founds “a new way” (Shelley 20), investigating unknown powers to which he unfolds, “the deepest mysteries of creation” (Shelley 20). This impossible search manifested, generating futuristic progression ideally based on vitalistic revival and electrical stimulation, increasing investigation throughout the science and medical community centered almost exclusively on the dead. The community’s investigation of ‘life-saving’ commenced a movement of inquiry on the unexplored theories of death, life, and vitalism. The exploration of reanimation encouraged researchers to harness the power of electrical current, suggesting that a body, not long after asphyxia, could be revived by means of extreme voltage. This Age of Reason (1685-1817) led Enlightenment theorists to believe that scientific knowledge was crucial in perceiving divine truth, as technological and medicinal experimentation was interpreted as justifiable in the quest of ultimate truth.

Victor Frankenstein represents an age of uncertainty, a destitute and weary quest for a principal of life and ultimate fatality. Victor abandons supernatural ideology and pursues scientific inquiry, pushing against the heavily guarded boundaries of research, while highlighting sentiments of rationality and romanticism. His prudence and moral is torn from his own principal

as he snatches the departed from cold grave to infuse “the spark of being into the lifeless thing” (Shelley 58). His objective is blinded by unnatural desire, as an uncontrollable compulsion to redesign human mortality inadvertently consumes him.

Prominent physicist Giovanni Aldini (1762-1834), nephew of Luigi Galvani, practiced ‘galvanic amendment’ upon the recently deceased. During the year of 1803, he tested galvanic principles upon executed criminals using a process he termed, ‘electrical-stimulation’, concluding that voltage sparked spontaneous muscle spasm or eye movement. Aldini’s initial compulsion for this disturbing experimentation fueled his invention of a machine to restore human life, “for the advancement of the welfare of the human race” (Rauch). This scientist revealed that a machine appeared to demonstrate a revival of human contraction; though a unique notion in its era, this philosophy still disappointed scientists attempting complete reanimation of human vitality. The medical profession grew rapidly, transcending the boundaries of an unethical search in effort to improve mankind’s vitality and enhance diagnoses and treatment. While Aldini originally intended these grotesque experiments to aid victims of asphyxiation or drowning, it is apparent that Victor’s character does not follow this same rationality, but instead uses the galvanic methods for a self-serving purpose. Victor’s consistent refusal of reasonability plagues his life. His cruel abandonment and rejection of the creature reflect warning to those seeking enlightened theories, cautioning the encroaching border between human and deific control.

CHAPTER II

THE SOUL AND ELECTRICITY

Frankenstein represents the eternal hunger for knowledge, dramatizing reality and embodying the deliberation of unethical obsession, birthing a god-like aspiration to cure mortality. This brilliant novel exposes enlightened philosophical thought conveying unethical irresponsibility, a detrimental deleterious monster, tragically illustrating science as a literary predator, an ultimate adversary to scientific enlightenment.

Victor seeks a fluid force, unbound by scientific law, a universal vitality as he stitches together a creature that would ultimately end his objective to design a 'new man'. The invisible force, which directed life, remained a mystery, a power that manifested itself as natural electricity. The soul's existence was popularly debated, as scientists sought to prove enlightened ideologies, rejecting the sacred and separating the ancient alchemical doctrines from modern theories. The origin of the unconscious remained a secret kept by religious dogma until the debated soul manifested in electrical chaos, a process stimulated by the metallic object. The eighteenth century audience witnessed the near-theatrical presentation of anatomical reaction, dramatically presenting the formidable energy of nature. *Frankenstein* "highlights the equivocal position of the scientist undertaking electrical research by drawing together various positions held by the Romantic and the materialist camps in their struggle for scientific authority (Willis 64). This Romantic notion emphasized that this force existed between the transcendental consciousness and electricity, which explains Shelley's hint at an unseen force able to exist between the world of the living and the dead, a force responsible for a manifested soul.

An enlightened progression of experimentation stirred public anxieties as mortality became significantly researched and ultimately feared. The basis for public apprehensions

resided in two distinct versions of death: incomplete and absolute. Mary Shelley draws upon the controversial debates (between 1814-1819) by eminent surgeons, John Abernathy and William Lawrence, known as the 'Vitalist-Materialist Debate'. John Abernathy, a leading surgeon, declared that a mysterious "superadded force was needed (to adequately explain life itself), some 'subtle, mobile, invisible substance'" (Butler 304). Vitalist theories assumed both science and religion combined to reform the soul, as electrical current encouraged life, considering that the power of animation could be abstracted from the dead, and manipulated by electrical stimulation. However, Lawrence detoured this outlook of vital principle, famously stating that the principle of life cannot be abstracted, theorizing that, "life is an assemblage of all the function of living body can perform." (Butler 306). Lawrence attacked Vitalism and denied the existence of a soul, stating that, "the theological doctrine of the soul, and its separate existence, has nothing to do with this physiological question.... An immaterial and spiritual being could not have been discovered amid the blood and filth of the dissecting room (Holmes 313). His denial of God and rejection of an invisible force collided with Abernathy, who defended the existence of a soul that united mind and matter. Yet while Abernathy and Lawrence struggled to define the vital principal, the radical inquiries suggested that the soul (often akin to vitalism) did not exist.

CHAPTER III

THE RENAISSANCE MAGUS AND THE SCIENTIST: MORAL RESPONSIBILITY OF THE DOCTOR

Victor Frankenstein perceives himself a creator, a mind, in which one pursues ultimate truth and defies fatality, a mistake poisoned by divine corruption, symbolically representing the biblical fall of mankind. Shelley epitomizes a genesis alignment, literarily exemplifying a tormented, clandestine man concealing himself alone in his laboratory, agonizing the great evil he birthed into the world, “I was seized by remorse and the sense of guilt, which hurried me away to a hell of intense tortures, such as no language can describe” (Shelley 61). Victor’s quest for celebrated recognition is perhaps what foreshadows his ultimate collapse; his disturbed youthful studies in the occult creep into his fixation on mortality and consequently annihilate his once creative, inventive mind.

Victor’s youthful studies epitomize his attitude regarding science as he became alarmingly fixated by the classical experimentations of ‘old science’ as he states, “yet so simple, that I became dizzy with the immensity of the prospect which it illustrated, I was surprised that among so many men of genius who had directed their inquiries towards the same science, that I alone should be reserved to discover so astonishing a secret” (Shelley 52). Young Victor obsessively studied authors such as Cornelius Agrippa, Albertus Magnus, and Paracelsus who dabbled in alchemy, which reflect his later fixated pursuits to discover the secret of immortality. The novel, though seemingly entwined with scientific investigation, represents these graphic experimentations as roughly empty interests, holding a senseless quest for forbidden knowledge. As Victor’s god-like aspirations begin to fade, his romantic imagination is plagued by fear and regret. His realization of the experimental tragedy plagues his mind, as he seeks to avoid

responsibility, rejecting the haunting creature. Victor is once again bound and chained by the divine rules he desperately dishonored.

Mary Shelley diverts the story from collective arguments of morality, focusing on ethical tribulations of the protagonist. Victor's condemned fate is a clear result of his irresponsible rejection of his creation and condemnation for attempting to perceive divine knowledge. Though Victor may have restored 'life' into the corpse, he did not possess sacred authority to create a soul for the creature. Mary Shelley intended Victor's morally unethical actions to reflect an act of transgression, as his penalty for dabbling in the divine results in devastating catastrophe, as his monster seeks revenge on Victor, preying upon his most beloved. His cruel abandonment of moral responsibility serves as an instructional morality, in which Mary Shelley uses to reveal the consequences of playing God.

CONCLUSION

Frankenstein evokes the unspeakable horrors debated by Romantic society and stirs ethical controversy, enlightening the dangers of scientific research, as well as the relationship between man, nature, and culture. It is of no mere coincidence that Mary Shelley's novel *Frankenstein* vividly unifies the abstract religious and radical notions of the Romantic era. She indulges these ideologies representing a philosophical materialism ultimately ending in eradication. Frankenstein represents human nature, composed of mortal and immortal dimensions, ironically reforming the denial of soul-body dualism, misleading religious ideology and escalating vitality and materialism. Victor's God-like objectives are disastrous, as his intentions are actively corrupt and unethical. His self-serving aggrandizement blinds his obsessive desire to cure death, resulting in tragedy. Mary Shelley replaces the supernatural element with social fear and unconventional gothic, illustrating eighteenth century historical context and biblical doctrine. Victor's divine creation seems to reflect warning to scientists seeking enlightened theories, cautioning the infringing boundary between mortal and divine control.

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