The discoveries of seventeenth-century natural philosophers like Descartes, Boyle, Hooke, and Newton not only revolutionized their primary fields of physics and astronomy; they also prompted new research programs in the fields of anatomy, physiology, and medicine.¹ The philosophers’ mechanical models of the universe held that universal laws of matter governed all inanimate objects, keeping them running like a piece of clockwork; this suggested that the body, too, could be seen as a piece of machinery, governed by the same laws. The body came to be viewed “as a machina carnis, a machine of the flesh”.² Consequently, medical men began to seek to uncover this machine’s inner workings— “to see the parts of the body they had been told about, and use this experience to help them reinterpret how the body functioned”.³ Dissection of corpses thus became an accepted and even necessary part of medical training, as one of the only ways for men to gain empirical, firsthand knowledge of the body’s interior.

However, controversy surrounded the question of whose corpses should be dissected. Research value notwithstanding, very few were willing to surrender their own bodies’ integrity for the sake of scientific progress. There was just one source of corpses that seemed potentially available for study: those of executed felons. Scientists—physicians, surgeons, and anatomists—

² Ibid.
were outspoken in claiming these bodies, arguing that their dissection would lead to greater medical understanding. These arguments seemed to have been accepted by the state, which, over the course of the century, granted physicians and surgeons the rights to increasing numbers of hanged bodies. Furthermore, the state approved the dissections taking place in public, and the opened body being afterwards exhibited for all to see.

Science depended on the justice system for corpses to dissect—in fact, historians have asserted that “advances in anatomy depended as much upon the ability of the surgeons to snatch the bodies of those hanged at Tyburn⁴….as it did upon the idealist transmission of knowledge”.⁵ But why did the state permit and even endorse dissection in this way? Historical documents suggest that it was not only a desire to spur scientific progress. Rather, for the state, dissection became a tool of social control—a fitting punishment for lawbreakers, and a frightening deterrent to crime for the rest of the populace. This amounted to a “happy coincidence between the interests of criminal deterrence and… those of Surgeons” and physicians.⁶ The convergence of medical and state interests made dissection both scientifically and socially useful, allowing the dissection of felons to become a common practice in 18th century England.

This paper will explore the ways in which science and the state worked in concert to shape and perpetuate the practice of dissecting of felons’ bodies. In particular, it will focus on how the spectacular nature of executions and dissections of felons both served and posed obstacles to both scientific and state agendas. The paper will first provide a brief history of dissection in Europe and the social conditions that led to a chronic shortage of corpses. Secondly, it will describe how dissection was made a public spectacle, and how this was essential to both

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⁴ A village in the county of Middlesex where London criminals were sent to be hanged.
⁶ Ibid, 77.
its medical/scientific utility, and its ability to serve the state as a form of law enforcement. Thirdly, it will discuss the resistance of the lower classes to public dissection, its resultant partial removal from the public sphere, and the associated social consequences. Finally, the paper will conclude with a discussion of how dissection shaped contemporaneous understandings of the human body, as well as understandings of the worth of human souls, within the social context of class divisions.

I. The History and State of Dissection in 18th Century England

The regular practice of dissection began in Renaissance Italy, where the bodies of felons were publicly exhibited and dissected once a year, during Carnival. At that point, dissection was widely regarded as a form of sacrilege, which could only be performed in that festival’s “upside-down world.” In England, letters patent granted by Queen Elizabeth accorded the Royal College of Physicians the rights to “the Bodies of One or Six Persons condemned to Death within London, Middlesex, or Surrey for Anatomical Dissection” every year. However, even with official sanction, dissection continued to be seen largely as an anomaly, and was viewed warily.

It was not until the 18th century, after the scientific innovations and the development of new research agendas discussed above, that dissection became more widely accepted. An article in *The Universal Museum* disdained old attitudes under Holy Roman Emperor Francis I, in which “the dissection of a human body was accounted sacrilege.” The author claims that as a result of this attitude, “Anatomy was a Science very superficially known, and physicians of those times must have been inferior in skill to the present.” By this time, dissection had clearly come to be seen as a necessary method for obtaining accurate information about the human body. As

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early as the beginning of the century, doctors in private hospitals had begun to conduct dissections as a regular part of training students. Furthermore, as an anatomist wrote in 1747, “It is not sufficient for a young Surgeon to attend Anatomical Lectures, and see two or three Subjects cursorily dissected; but he must put his Hand to it himself, and be able to dissect every Part”. Thus, by the 1740s, having not only observed, but actually performed dissections was considered essential to being a fully trained surgeon.

This shift in anatomical method led to a greatly increased demand for bodies. The six bodies of felons granted annually to the Royal College of Physicians had been the only official source, until the Company of Barber-Surgeons were likewise granted the rights to the bodies of four felons a year in 1723. Still, this provided only ten bodies for dissection every year, and those medical practitioners working in private teaching hospitals found themselves completely shut out of the market. Some resorted to robbing graves or bargaining with felons prior to their execution in order to obtain material for their scientific pursuits. Others regularly gave executioners gifts of “Christmas-boxes” or small fees in exchange for seizing additional bodies for their use. This problem of limited supply, however, was somewhat alleviated when the state decided that its own interests, as well as science’s, would be well served by endorsing dissections.

II. The Value(s) of Dissection as Public Spectacle

Dissection—or autopsy, which refers specifically to the anatomical dissection of persons—became invaluable to scientific inquiry in the 18th century because of its spectacular

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13 Ibid, 72.
nature. The word *autopsy* is derived from the Latin *autopsia*, which in turn came from the Greek word *autoptes*, meaning “eyewitness”.

This etymology shows that the direct visual “witnessing” of the body was autopsy’s defining feature, just as much as the cutting and dissecting more commonly associated with the word. Autopsy made the body a spectacle, giving scientists the opportunity to directly witness and observe its interior. Moreover, autopsy enabled observation by many onlookers at once; we see this in an illustration of a dissection that took place at the Surgeon’s Hall in London. The eviscerated body is laid out in the center of the hall, and some twenty medical students have the opportunity for direct, empirical observation of the body. Because it could thus make the body a public spectacle, dissection became an essential tool of science, not only as a mode of investigation, but also as an indispensable teaching method.

The spectacular nature of dissection gave scientists the power to not only observe the human body, but also—it seemed—to know it so thoroughly that they could actually control it. At the same time, the spectacular nature of dissection also became a way for the state to demonstrate its power and absolute control over the bodies of its subjects. Both the execution and dissection were made as much of a spectacle as possible, in order to serve as powerful warnings and deterrents to the large audiences that witnessed them. First as a contemporary essay wrote, “the body was hanged *in terrorem*, testimony to the Majesty of the Law, a Dreadful and Awful Example to Others”. Furthermore, the warning was verbalized through the condemned prisoner himself, who was forced to give a “dying speech [that ideally] was a full confession, and a warning to youth”.

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But the strongest and most terrifying warning came not from the execution itself, but from the impending dissection of the felons’ bodies. In allowing dissection to be performed on felons’ bodies, the Crown was motivated “less by hope of [advancing science by] causing ‘Health and Sound Limbs’ than by the anticipation of dishonour”.\(^{18}\) This would serve as both a fitting punishment for criminals, as well as a deterrent to crime for the rest of the people. To be effective, though, the knowledge of how the bodies would be treated had to be made as public as possible. Therefore, it was both pronounced and acted out before large audiences; in fact, “an integral part of the punishment was the delivery [of the body] from hangman to surgeons at the gallows following execution”.\(^{19}\)

Moreover, by mid-century, the state had deemed it “necessary that some further Terror and peculiar Mark of Infamy be added to the Punishment”\(^{20}\) of criminals to be an effective social deterrent. Thus, in 1752, Parliament enacted the Murder Act, which made the actual dissection itself—and not just the knowledge of the bodies’ fate—a public spectacle. Public dissections then became a widely recognized social phenomenon, as seen in the satirical comic “The Four Stages of Cruelty” drawn by William Hogarth. In the final panel, entitled “The Reward of Cruelty,” we see the brutal dissection of the criminal Tom Nero, his presumably dead face nevertheless looking agonized as his intestines and organs are pulled out.\(^{21}\) While the title is meant to be ironic, the comic still reveals the dominant rhetoric surrounding dissection at the time: dissection was widely regarded as the wages of sin and a mark of unbearable shame.

Finally, what made public dissection a particularly horrifying punishment was the fact

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\(^{19}\) Johnson, D.R. “Introductory Anatomy.” Faculty of Biological Sciences, University of Leeds. [http://www.leeds.ac.uk/chb/lectures/anatomy1.html](http://www.leeds.ac.uk/chb/lectures/anatomy1.html) (accessed December 8, 2008).


that it ran directly counter to important funerary rites. We see many examples of felons in their final statements begging not for pardon, but for a “decent” and “Christian burial”. Popular burial customs were quite elaborate—in effect spectacles in themselves, “celebrated with far more pomp than marriages or baptisms”. These were a way of paying respect to the dead; they may have also provided the poor with coping mechanisms to deal with the high death rates in their community. However, these customs almost always depended “upon the integrity of the corpse… [and were therefore] brutally violated by the practice of dissection”. By handing over the bodies of felons to be dismembered, the state not only created public spectacles that served as punishments and social deterrents to crime; it also specifically precluded the people from having their own spectacles, which would allow them to pay their respects to the dead and come to terms with death in their own way.

III. The Dangers of Spectacle and the Effects of Private Power

The people—that is, the lower classes to which felons usually belonged—did not passively accept the appropriation of their bodies for the dual purposes of advancing science and demonstrating state power. Rather, “hangings were often attended with disruptions, threatened rescues, disorders, brawls, and riot”. The major cause of these disturbances was not just the hanging itself, but the knowledge that the bodies were soon to be desecrated by surgeons—in other words, the obvious “relations between the judges sitting at the Old Bailey and the surgeons

Families and friends of felons often attempted to protest and disrupt this relation, by forcibly taking charge of their bodies after execution. Moreover, this violence usually occurred at the exact moment when the bodies were being transferred from executioner to surgeon, when the alliance between science and state power was made manifest.

But even as the people protested this association, it grew stronger: the scientists appealed to the state to protect their common interests in having the dissections continue, and the state provided Royal Foot Guards to “attend the Publick Executions… to see that no Interruption be given in the taking away so many Dead Bodies yearly as are granted”. Despite this, especially after the Murder Act of 1752, hatred of and violence against all types of surgeons intensified to unmanageable levels. As a result, in 1783, the state decided to reduce the dangers associated with public executions and handoffs of bodies. Rather than parading prisoners through the city to a centrally located gallows, hangings were carried out within prison walls. Furthermore, the transfer of felons’ bodies to surgeons afterwards was also removed from the sight of the general populace. This was a major “step toward privately inflicted punishment”, and signaled a larger shift in how both science and the state sought to use the felons’ bodies for their respective ends.

While this measure may seem to be a case of state power caving to public pressure, it can also be read as the opposite: a solidification of state power, and the concomitant defense of science’s interests. The state did not at all reduce its harsh punishments, only removed them from sight; felons were still executed, and their bodies still handed over to scientists to be unfeelingly dissected. Furthermore, it was still well known among the common people what would happen to the bodies after execution, so dissection could continue to act as an effective deterrent to crime.

27 Ibid, 69.
28 Ibid.
29 Ibid, 76.
The only difference was that people no longer had a chance to protest or resist the state’s actions. As Henry Fielding commented, having the execution and transfer of bodies occur “behind the Scenes… will affect the Audience with greater Terror than if it was acted before their Eyes”.\(^{31}\) This increased terror resulted from the clear message that the appropriation, manipulation, and violation of bodies, by the combined powers of science and state, was not subject to approval by the lower classes. Thus, making the transfer of bodies from executioners to surgeons a private act rendered the act uncontestable, actually upholding the powers of both parties.

IV. Effect of dissection on scientific and popular understandings of the body

The result of the gradual acceptance and spread of dissection as a practice was “a significant change in attitude towards the dead human body”.\(^ {32}\) Rather than being seen as an integrated part of the human being, the corpse became a separate entity, with a material value completely divorced from the goodness or evil of the soul that had inhabited it. The body became a “commodity with all the attributes of a property. It could be owned privately. It could be bought and sold”.\(^ {33}\) Moreover, this reification and commodification of bodies took place within a context of clearly delineated class divisions, and was justified by overtly classist rhetoric.

In this transformation of attitudes toward the corpse, scientific rhetoric played a premier role. As natural philosophers came to imagine the body as a machine, they also substantially revised notions of how bodies were inhabited by souls. Departing from Renaissance medicine’s conception of “‘corporeal’ souls,” in which “the materiality of the flesh accommodated and even

\(^{31}\) Henry Fielding, *An Enquiry Into the Causes of the Late Increase of Robbers, &c.: with Some Proposals for Remedying this Growing Evil* (London, 1751).


\(^{33}\) Ibid.
required spirits”, 34 scientists came instead to see man as “a tripartite being.” Man had a material body, an animal soul that governed the body, and a rational soul that was superior to both; only this last part of the human being was “immaterial and immortal”. 35 This stripped the mundane flesh of its spiritual powers, and justified the “necessary Inhumanity” (what we now call “clinical detachment”) involved in dismembering it, 36 as anatomical lecturer William Hunter wrote in 1751. 37 As such, the corpse, an “object of veneration and supernatural power in popular culture,” became “transmuted into an object of scientific study and commercial exchange”. 38

Progressive thinkers were outspoken in their promotion of this new, “enlightened” view of the body. The London Medical Gazette ridiculed the idea that “the immaterial spirit still clings to the mouldering body, and can be affected by what it suffers” as “a notion for the times of ignorance and darkness”. 39 Similarly, in 1725, Bernard de Mandeville disdained the “superstitious reverence of the vulgar for a corpse… and the strong aversion they have against dissecting them”. 40 Instead, de Mandeville argued that dissection would contribute greatly to the “improvements of Physick and Surgery.” Thus, we see how scientific attitudes and priorities promoted an objectified, reified view of the body, which emphasized its utility over its integrity and sanctity.

However, even as members of the educated elite thus ridiculed the lower classes for holding backwards beliefs about dissection, they seem to have been hesitant to apply their own,

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36 We can see this “Inhumanity” in the Malefactor’s Register print, in which the medical school students present at the dissection look on with keen but completely unsympathetic interest.
38 Ibid, 29.
enlightened beliefs to their own bodies. Rather, they were only able to stomach the objectification and dissection of bodies when performed on members of the lower classes they so disdained. Thus, de Mandeville casually reassures the elite readership of his article that if the dead still seemed to be defiled by this procedure, “the Dishour would seldom reach beyond the Scum of the People.” Clearly, “clinical detachment” was not an indiscriminate gaze, but referred specifically to the cool, unsympathetic observation of lower class bodies by upper class professionals. Not all bodies, but especially poor bodies became “reified [and commodified] within the anatomical and surgical fraternity”.

At the same time, contemporary conceptions of the body were also shaped by state rhetoric concerning dissection. The state’s arguments adopted the utilitarianism of the scientists, again transforming the body into a necessary tool for scientific progress. However, it uniquely emphasized not only the usefulness of the body as a tool, but also the state’s right to use that tool for its own benefit. It justified dissection by claiming that it made felons finally useful to the country, after a life of delinquency; in this way, dissection became not only a humiliating punishment, but also a bizarre kind of forced redemption. In an even more extreme extension of this argument, some suggested that the bodies be used as a source of amputated limbs for soldiers and sailors. A letter to the College of Surgeons in 1787 argued that this would enable “good to result from evil”—the “good” being both “eternal salvation” for the felons and “the high advantage resulting to our fleets and armies” (the latter being stressed significantly more than the former). Thus, state rhetoric created notions of bodies as effectively belonging to the

41 While autopsies were performed on other members of society, they were typically done only to investigate cause of death, and required the consent of the deceased or their family (see McMahon, note 3).
state, always able to be enlisted into serving its needs—and supposedly, even eager to do so.

Moreover, these claims again only seemed to be made on to the bodies of citizens from the lowest classes, as the state “mixed arguments of medical utility…and penal retribution with attitudes of class hatred”.  

Meanwhile, all of these utilitarian and objectifying conceptions of felons’ bodies directly conflicted with popular beliefs, held by the lower classes to which felons belonged. Popular lore still held that the body and soul were intimately connected, that “the soul slept in the grave…being present in or near the body after death”, and that “the behavior or family and friends toward the body could affect the fate of the dead person’s soul”. This was what made dissection such a horrible fate: beyond just being disrespectful to the dead, it made it impossible to “ensure the dead’s peaceful departure from this world. Moreover, since the soul would still be tied to the body for all eternity, dissection would make them “condemned to wander, mutilated and with identity lost” forever. Finally, the bodies of felons were believed to gain supernatural powers of healing after execution, becoming able to cure all manner of complaints, from headache, to ague, to infertility. Dissection took away this power, which had been a crucial way for communities to reclaim and re-empower members extirpated by the law.

The violent clash between these popular beliefs and “enlightened” rhetoric reveal contrasting notions, not only of the worth of the felons’ bodies, but also of the worth of felons as

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human beings. While the lower classes believed that felons’ bodies still housed deceased souls requiring respect and care, scientists and state officials saw these lower-class bodies just as masses of blood, bones, and muscle… which probably did not house souls, but if they did, certainly not ones worthy of concern. In addition, while the lower classes “honored the felon’s corpse with powers of healing”, 51 science and the state humiliated the corpse, transforming it into a commodity. As such, felons were no longer useful to their own communities, but rather forced to be useful—and used up—by their “social betters” in medical science and state government. Thus, the dissection of felons became an embodied form of class discipline: elite scientists and state officials worked in concert to exploit lower class bodies, dismiss their beliefs, and summarily deny the worth of their souls. At the same time, the lower classes mounted an ongoing resistance, constantly challenging and sometimes successfully disrupting the performance of dissections. In this way, although we tend to view only elite academics as notable figures of the Enlightenment, the common people too left an important and lasting mark on history: they publicly rejected the desecration of human beings for the pursuit of inhumane science and the exercise of brutal state power.

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