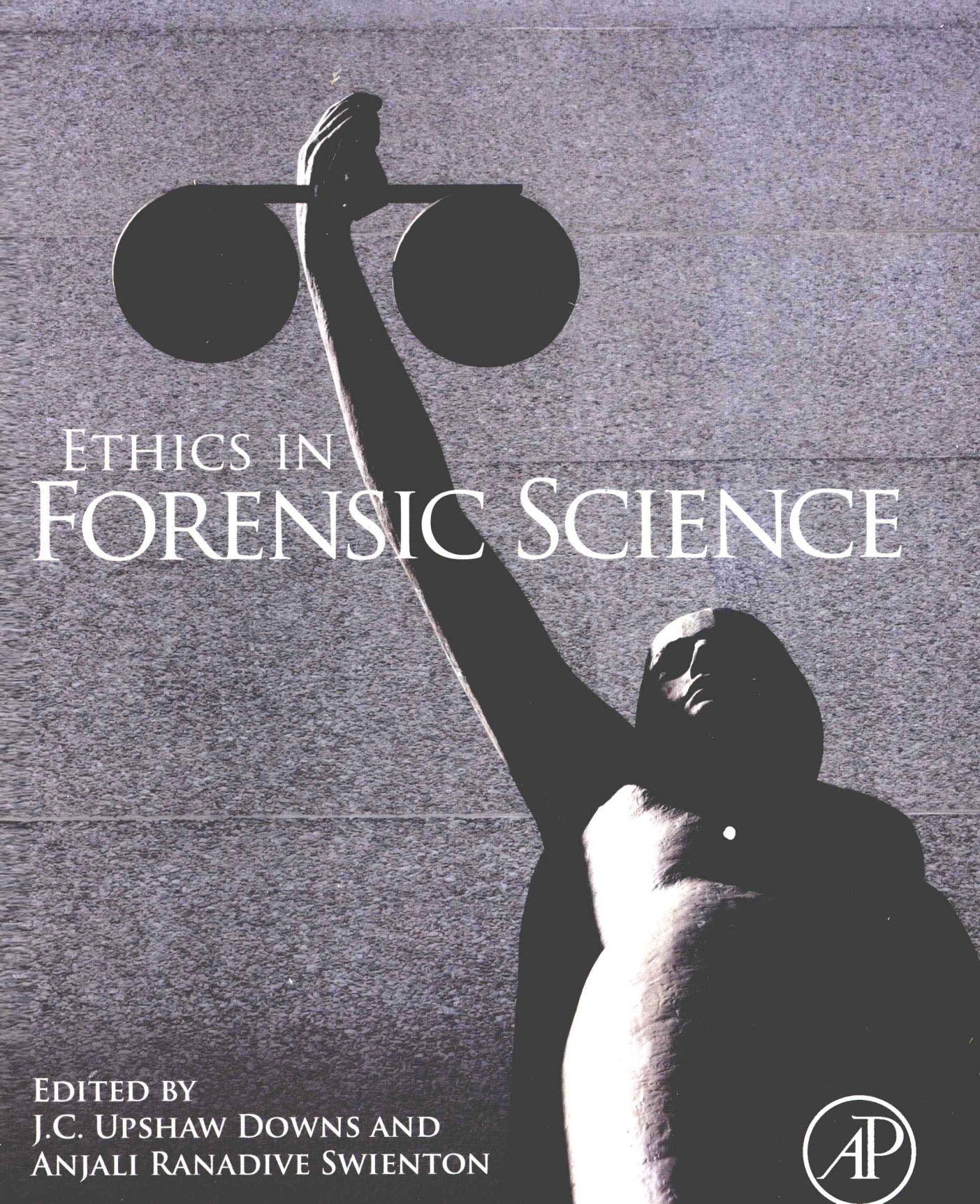
ETHICS IN
FORENSIC SCIENCE
EDITED BY
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AP

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And he said, "Go, and say to this people: Keep on hearing, but do not understand; keep on seeing, but do not perceive. Make the heart of this people dull, and their ears heavy, and blind their eyes; lest they see with their eyes, and hear with their ears, and understand with their hearts, and turn and be healed."

Isaiah 6:9-10

J.C. Upshaw Downs

Is the Truth a Fact?

The essence of forensics would seem predicated on the affirmation of this query. Yet the ready acceptance of the self-evident is all too often the downfall of the impartial scientist. After all, since antiquity dogma has taught various "truths" such as that the sun orbits the earth, that the earth is flat, that humans are incapable of flight, and so many more. One's personal "truth" is a matter of perspective based on interpretation of events and observations as filtered by the experiences of a lifetime. Arguably, certain conclusions seem immutable – for example, the truth that "blue is blue" seems beyond question. Yet beyond the obvious nuance of shades and hues (all those qualifiers from "sky" to "royal" to "navy" further clarifying the precise meaning of the intended representation of factual color) is a far more subtle matter of interpretation. Do two individuals, looking at the same sample, actually process the image to arrive at precisely the same mental representation of the physical world? For those with the inability to perceive a specific color the answer would seem an emphatic "no", yet perhaps the specific spectral range is uninvolved in that individual so that there is, in fact, no difference. Perhaps the subject is unaware of an isolated deficit in an otherwise "normal" visual system. Obviously, overall structural design (lenses, receptors, neurons, etc.) is identical and the truth is that all else being equal, inter-individual variance in ultimate interpretation should be negligible – but is the difference actually zero, especially in biological systems? Is it possible to *know* the factual answer with *absolute* factual certainty? Is such a theoretical possibility of difference significant in ascertaining the truth? These latter musings provide fertile ground in considering ethics in practice. The inquiring mind of the scientist might well ask, "Could I be wrong here?"

Ultimately, in the world of forensics, specifically within the courtroom, the jury is the sole arbiter of fact and the judge is the sole arbiter of the law. From these derive "truth" by way of verdict. Placing any single entity as *the* authority can and inevitably *does* on occasion beg controversy, whether well-founded or not. As verification, consider whichever most recent high-profile case where popular opinion and the jury's conclusion are at odds. The phenomenon of jury nullification, whereby the jury reaches a verdict contradicting the judge's instruction of the law, creates an obvious paradox. Facts remain immutable yet the "truth" as determined by each arbiter remains. A defendant who actually committed the crime of which accused, on receiving a "not guilty" verdict in combination with the presumption of innocence has an instantaneous annulment of the act, meaning the "truth" of the law is that the accused did not

do precisely what they have, in fact, actually done. The accused's constitutional right to be tried by a jury of peers leaves open the potential for facts to be misinterpreted, misunderstood, and even ignored. The implicit constitutional authority granted is that:

The jury has the right to judge both the law as well as the fact in controversy.[1]

The American system of jurisprudence is founded on a jury's ability to reach an "erroneous" conclusion or "truth" by discounting fact for a real or perceived greater purpose – or on a whim. But recall that the jury has the advantage of perspective, having heard all the facts in evidence and considered same in light of the realities of daily life.

In evaluating the significance of perspective, one might envision a four-faced pyramid whose summit is the ideal of absolute impartiality. The underside of the base represents reality, which is easily obscured by the opacity of obfuscation of all that follows the actual crime. On opposite faces are the diametrically opposed principles of truth and falsehood, with the adjacent opposed surfaces representing prosecution and defense. In a perfect world, all sides – especially the judge and jury – occupy the pinnacle of neutrality, having the potential vantage of objectively seeing all sides without distortion or murkiness. All perspectives are identical and conclusions are easily reached based on facts. As one falls from the acme of grace occupied by absolute objectivity, a "side" is taken – by choice or necessity. The inertia inherent in shifting from the balance of the extremum leads to a more restricted position that only becomes more entrenched if not held in check. The net result being that the adversaries in the system, occupying the slopes of truth/falsehood or prosecution/defense, have vastly different viewpoints. If these are too far removed from the summit of objective neutrality the foes would lack the ability to see the opposite view. If too heavily entrenched, the players might find themselves at the base and thus become not interpreters of reality but actual participants in shaping factual events. Even if not so far polarized, prosecution and defense positions can see the same facts (the true and the false) differently but cannot visualize their opponent's slope. Only by peering over the peak of the pyramid can one simultaneously see and understand all sides of the issue in order to identify fact versus fiction and be that unbiased reporter of fact that the forensic practitioner strives to be.

Similar to the professional journalist, the forensic practitioner has a foundational duty to independently and accountably seek and report facts while minimizing harm.[2] Reportage is not advocacy and vice versa. Ideally all practitioners strive for the objectivity of the pinnacle in each and every case. Shifts in perspective can occur subtly and imperceptibly. Maintaining neutrality requires diligent effort in order to keep potential biases in check. Clearly, practitioners should maintain an absolute foundation of balanced perspective – recognizing falsehood is essential in avoiding it! A quick test of one's ethical status quo may be as simple as considering if "the other side" has a point.

If so, *why* is one opinion right and the other wrong? Are the views equivocal or is one attempting to skew data by equating possibility with probability or even certainty? If so, is this readily apparent and understood by all parties? The reality of forensic practice is that perceptions that one is working "for" the prosecution or defense can be part of the job. The ethical forensic practitioner should never lose sight of the core principle that one's actual duty is to the people and only by continuously striving to maintain that highest neutral apex of integrity can the practitioner hope to present the unbiased facts of a case to the jury. The ultimate ethical challenge in forensic practice is to embrace instances where the facts lead the scientist and the jury to opposite conclusions, as such instances demonstrate an appreciation for an essence of American jurisprudence:

> *... it is not only [the juror's] right, but his duty, to find the verdict according to his own best understanding, judgment and conscience, though in direct opposition to the direction of the court.*[3]

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CONTENTS

CHAPTER 1

A Brief History of Ethics

Jennifer Downs

In civilized life, law floats in a sea of ethics.

Earl Warren[1]

How ought one live? This question represents the foundation of centuries of debate concerning the philosophy of ethics, a subject that writers from every country across every generation have discussed, dispelled, and posited their thoughts on without yet reaching a consensus. The voices in this dialogue are cross-referential, building upon and responding to preceding theories as each philosopher takes their distinct stance on morality. The idea of good and evil has been filtered through multitudinous perspectives, allowing for questions not only on the goodness of actions but the use, rightness, morality, and justness of actions.

For the ancient Greeks, the code of moral correctness was represented by the epics. Writers like Homer sang the praises of virtuous men, holding such characters up as paradigms of virtuous action. It is evident in the *Odyssey* that these heroes looked to the pantheon of Greek gods as their resource for right living. Regardless of true belief in the existence of such beings, the characteristics of the various deities, as outlined in myth, informed the actions of heroes like Odysseus.

> *[…I] t is clear that Homer invokes the gods in order to account for the observation that a central form of human excellence must be drawn from without. A god, in Homer's terminology, is a mood that attunes us to what matters most in a situation, allowing us to respond appropriately without thinking.*[2]

In this way, the Greeks had a model to inform their own behavior and by which to judge others. Since the fall of ancient Greece, other philosophers have taken an opposing stand, insisting that morality is a relative feature of the individual – that no preset code applies to all people in all circumstances.

The changes in ethical philosophy over the years reflect sociological shifts that, in responding to contemporaneous events, intellectually summarize the social understandings and reactions to socio-political changes. Despite the constant flux of thought, at a very base level, ethics strives for a cohesive society. Philosophers describe their ideal; the most functional and productive structure of society, thus laying out their best

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plan to achieve such an end. Whether the source of ideal cohesion rests in the individual or the community at large has yet to be determined, but the debate continues.

1. META-ETHICS: WHAT DOES "RIGHT" MEAN?

Meta-ethics is concerned with the epistemology of ethics, posing conceptual questions to define the origins and limitations of ethical statements and challenging the use of moral predicates. Fundamentally, this is a branch of philosophy concerned with the inherent existence and man's understanding of "goodness", and addresses this concept through conceptual and epistemological questions.

The advent of meta-ethical theory is tied to increased interest in linguistic philosophy at the outset of the 20th century.[3] We utilize moral predicates like "good/evil" and "right/wrong" in association with behavior to define our understanding of the ethical nature of a given action. Initially, a moral verdict like "it is wrong to cheat", seems like a simple deduction, yet the parameters of "wrong" have not been defined, so there is no value to this statement. Meta-ethics attempts, in various ways, to provide the necessary parameters in order that a valid ethical conclusion be reached.

The most crucial debate within meta-ethics is the source and meaning of human values. For objectivists, values are innate, existing regardless of human comprehension. Because these values are inherent in the world, they are knowable, and ought to universally govern human behavior.

Alternately, relativists conclude that the values we attribute to things are defined differently, depending upon the environment of the definer, and so these values cannot be granted absolute meaning. An individual's understanding of "right" and "wrong" is true relative to their experience. For this reason values do not have collective definitions and cannot be universally employed. From the relativists' perspective comes the question of how to make moral judgments without a definite framework. This non-cognitivist branch of meta-ethics proposes that the application of moral predicates correlates with our application of emotional conditions. Within a certain environment, death makes us feel bad, we expand this feeling to perpetuate a moral absolute that all death is inherently "bad". This emotion takes on an inscrutable moral quality so that the position "capital punishment is morally bad" is inscrutable by extension. Non-cognitivists propose that this type of association is the basis for all positions of morality, meaning that truth is relative to personal opinion shaped by experience: thus there is no absolute truth.

> *It is commonplace to assume that the questions of meta-ethics are logically prior to those of normative and applied ethics, and that there is no use proceeding with either normative or applied moral philosophy without coming to certain definite conclusions about matters of meta-ethical concern, but this assumption has also been disputed. For one may be right in regarding moral statements as cognitive and moral argument as possible without having any sort of elaborate meta-ethical theory to justify this view.*[4]

2. NORMATIVE ETHICS: HOW OUGHT PEOPLE TO ACT?

What meta-ethics defines as objectivism relates to a branch of philosophy called normative ethics. Here the universality of values is accepted and a rational justification for these values is sought. Normative ethics is concerned with paradigms of ethical behavior and operates in a prescriptive manner, establishing moral absolutes by which society should live. The maxim known as the "Golden Rule" is an ideal representation of normative application, as some version of this principle has been represented in most societies throughout history. In the Judeo-Christian tradition the rule teaches that one ought to "do unto others as you would have them do unto you"[5] defining good behavior as the treatment one would expect for one's self. Normative ethics can be further broken down to four theories, as follows:

Virtue ethics focuses on the moral state of the individual as the source of ethical behavior, rather than compliance to an external code of conduct. The morality of an individual comes from their internal character, which is reflected in the decisions they make, therefore the actions they choose to perform are less important than the justification for their behavior. Proponents claim that this approach:

> *Offers a more unified and comprehensive conception of moral life, one that extends beyond actions to comprise wants, goals, likes and dislikes, and, in general, what sort of person one is and aims to be.*[6]

Deontological ethics, having its root in the Greek *deon*, or "duty", determines morality based on adherence to rules. Actions have intrinsic moral implications, and ought to coincide with an individual's moral obligations, regardless of the consequences associated with such action. There are many theories regarding deontology, but they:

> *have in common the basic premise that the right is prior to the good and that beneficial results do not determine one's moral duty. They emphasize fidelity to principle and the independence of rightness, which is the main focus of moral life.*[7]

In opposition to deontology is teleology, with the Greek root *telos* meaning "goal", wherein what is right is determined by what is good. Here morality is determined by the consequences of action. C.D. Broad defined the modern understanding of teleological ethics writing that they:

> *hold that the rightness or wrongness of an action is always determined by its tendency to produce certain consequences which are intrinsically good or bad.*[8]

Right action can be determined as that which yields the greatest good for the greatest number. This philosophy can be seen in various permutations in the practice of utilitarianism, egoism, hedonism, intellectualism, welfarism, etc.

The final branch of normative ethics is pragmatism, which suggests that morality is in a state of constant evolution, in a similar way to scientific knowledge. Over the

course of many generations, advances are made, and our understanding of what is right changes to reflect new ways of thinking.

> *Out of native impulses, some desires arise, leading to actions that form habits. Habits "constitute the self", becoming one's character. They lead to certain kinds of further action that may cause re-evaluation of past desires, a transformation or enlargement of them with respect to their objects, or a deepening of their meaning with broadened experience.*[9]

This theory views character as an active process which can be influenced or manipulated through experience, therefore social reforms should be implemented to provide socially significant lives.

3. APPLIED ETHICS: HOW DO PEOPLE IMPLEMENT MORAL KNOWLEDGE?

The application of ethical theory in practical situations falls under the category of applied ethics. Unlike meta-ethics, where the aim is to understand the nature of moral concepts, or normative ethics which explores moral "norms", the field of applied ethics pertains to the use of ethics to mediate real-life conflicts between what distinct parties view as right and wrong. It is difficult to find a situation free of ethical concerns, yet applied ethics is a relatively recent addition to the field.

> *The importance of applied ethics became obvious first in the medical context, where in the aftermath of World War II and the expanding interest in human rights, developments in technology gave rise to challenging ethical issues such as the use of transplant technology and the allocation of scarce resources such as kidney dialysis.*[10]

In any instance where group or individual interests conflict, it is necessary to look to ethical theory for a resolution: business, law, government, medicine, science, religion, sports, etc. The modern interest in how to pursue what is "right" in such a comprehensive manner, bringing ethics and the impetus for equality into so many aspects of life, proves our desire to strive for the greater good. As Albert Einstein urged, one ought to "try not to become a man of success, but rather try to become a man of value."[11]

4. MORAL PSYCHOLOGY: WHAT DO PEOPLE THINK ABOUT WHAT IS RIGHT?

Moral psychology can refer to one of two fields, the first of which is the study of the development of the moral choices of the individual over time, and the second is the overlap between psychology and ethics, where the mind bears relevance to morals.

> *[...M]any normative theorists have maintained that there is a close connection between pleasure, happiness, or desire-satisfaction and a person's good, and these things are also a concern of philosophy of the mind. In addition, the rightness of actions is often held to be closely connected to the motives, beliefs, and other psychological phenomena that lie behind those actions.*[12]

The interest here lies in the thoughts of an individual, what they define as "right/wrong" and how they reach these conclusions.

> *Moral psychology has had a revival in the second half of the twentieth century. It involves work done both by empirical psychologists and philosophers and is devoted to reflection on how morals are acquired or developed, the role of emotions in moral life, how resistance to evil is inculcated, and so on.*[13]

This kind of research does not uphold any ethical theories as absolute, rather it explores they ways in which individuals and groups engage with ethical concerns.

5. DESCRIPTIVE ETHICS: WHAT DO PEOPLE PROFESS IS RIGHT?

Descriptive ethics is simply the study of what people do believe or have believed about social morality and how those beliefs are implemented in action. As a discipline, it relies heavily on sociology and anthropology to relate the beliefs from variant cultural groups, from which one can extrapolate future behavior. This method can also be applied to ethical codes implemented in a professional environment. Like moral psychology, this is not a field that promotes any particular ethical belief; rather it interprets those pre-existing as they are implemented.

5.1 Old Testament (1200–100 BCE)

The earliest recorded code of ethics is found in the Tanakh and Talmud, the sacred scriptures of the Hebrews which were transcribed beginning in 1200 BCE. These writings document the history of these peoples within a moral context. Moral understanding for early Jews was inextricably combined with their belief in Yahweh. The Jewish expression of faith is founded in a complex system of social laws known as the *halakah*, wherein right action ("morality") is a reflection of one's obedience to God. Jewish philosophy is reflective in nature; one ought to behave in the likeness of God's holiness or "*kadosh*".

> *As God is merciful, forgiving, just, and kind, so his people must be merciful forgiving, just, and kind.*[14]

This sociotheocratic belief system sees Yahweh as the moral epicenter for all mankind, pointing to the Decalogue (the Ten Commandments) as a succinct form of the highest ethical code for all men.

5.2 Hinduism (100–400 BCE)

Hindu literature dates as far back as 1000 BCE, promoting ethics as a means to *moksa*, or liberation from the cycle of reincarnation. The ultimate deity in this religion is Brahmin, the impersonal expression of absolute truth to which all men should aspire.