

## LAW—AN UNSCIENTIFIC SCIENCE

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MODERN man has learned that in his mastery of his physical surroundings and of his own body his success has been in direct proportion to his factual knowledge. In these two realms he has ceased to be dominated by magic and by emotional analogy. He no longer assumes that the inventor must be a communicant of the devil and that the damp night air rots the lungs. But there is a third great area—the social environment—in which the old ways of thinking still dominate public action. We do not say that a motor car's performance is satisfactory because it is full of the spirit of efficiency. We are no longer content to classify the undernourished child as just naturally puny. But large numbers of us are willing to say that recent economic conditions were due to a depression, that Dillinger became troublesome to society because of his hard character, that the old-time barroom drunkard can be eliminated if tables are substituted for bars and if saloons are called taverns.

While the scientific method has been employed to transform the face of the earth and the physical conditions of life, and while that same method has been employed to develop hardier bodies and to suppress at their sources many of the infectious diseases, only slight application of this mode of thought has been made to the problems of social control. The sociologists have coined the term, cultural lag,<sup>1</sup> for this peculiar state of modern society in which we utilize the scientific and fact-minded attitude in dealing with physical and biological problems and, at the same time, insist upon remaining free from the restraint of fact in our enterprises of social control.

There is a natural science of psychology which is busy applying the scientific method to that crucial area called *Mind*, where the physical, the biological, and the social worlds meet and exhibit their interdependence. There is a natural science of sociology which is concerned exclusively with the facts of social life. Occasionally a psychologist or a sociologist has timidly suggested that his ideas might be useful in connection with the larger problems of social regulation. Occasionally a practical man—a lawyer, judge, or politician—has similarly suggested the advantage of a fact-dominated attitude toward social problems, but

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1. On Cultural Lag, see Report of the President's Committee on Social Trends, *RECENT SOCIAL TRENDS IN THE UNITED STATES*; SOULE, *THE COMING AMERICAN REVOLUTION* (1934) 193 et seq.

the influence of such voices has been small. Mr. Aldous Huxley said recently that international maladies are at bottom questions of psychology and that the diplomats who have been called to the sick bed simply do not possess an intellectual viewpoint adequate to their task.<sup>2</sup> Yet there is certainly little immediate prospect that psychologists will be consulted in regard to problems of such magnitude and importance. The more urgently necessary is a social adjustment, the less likely are our leading citizens to tolerate a frankly psychological and sociological approach to it.

Where psychological and sociological data have been brought to bear upon the making or enforcement of the law, they have rarely been permitted to operate except in weak solution. When legislators seek to adjust a delicate mechanism like the sale of securities or the institution of marriage, they may call for the testimony of objective and disinterested men, but their resulting statutes are invariably encumbered with words of merely emotional relevance.<sup>3</sup> Such a practice would not represent a cultural lag if it were knowingly employed, but the experts are continually mistaking the vividness of their moral indignation for the probable efficiency of their devices for social control.

#### *Lawyers Are Social Engineers*

In our control of physical nature we are served by a special class of men called engineers, who are rigorously trained, not only in the practical tricks that can be used in the harnessing of physical forces, but also in the mathematical and experimental sciences necessary for straight thinking about the physical world. Within their own sphere of activity the engineers constitute, in the finest sense, an élite. It is generally accepted that the outstanding peculiarities of present-day western civilization are principally contributions of the engineer. The one set of ideas in which the western world has any real confidence is that composing the physical sciences—and the physical sciences are the engineer's philosophy.

Our present mode of life is undergoing severe criticism which at times might seem to reflect upon our engineering leadership. It is said by some that we have been paying too much attention to the control of the physical world, that we have been too distracted by the materialistic philosophy. The suggestion has been made (and not exactly in jest) that the engineers and other natural scientists ought to take a holiday in

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2. Huxley, *Do We Require Orgies* (1934) 23 YALE REVIEW 466.

The psychologist, himself, must assume a considerable share of responsibility for the absence of a psychological viewpoint in our attack upon important problems. He has too often assumed that he had a duty to hold aloof from large problems of public policy. See Robinson, *Psychology and Public Policy*, (1933) 37 SCHOOL AND SOCIETY 1.

3. See for example, Douglas, *Protecting the Investor* (1934) 23 YALE REVIEW 521.

order to permit social adjustments to the changes they have wrought. But such criticism simply emphasizes the effectiveness of engineering leadership. As a matter of fact, the notion that each increment in our control of the physical world sets us back psychologically and socially is largely illusory. Engineering leadership has given us unprecedented productive facilities. No one can escape the fact that poverty is, at least in America, an unnecessary social condition. But we have poverty—widespread poverty—despite our physical equipment. There is a disposition under these circumstances to say that our present social troubles are due to the fact that the engineers have led us onward too rapidly and that somehow our very material progress has been our undoing. Men indulge in nostalgic reminiscences of the old times when self-sufficient farms operated by the power of muscles were the centers of life. Though poverty may have existed then, it somehow was not a source of such widespread public anxiety. But at least since the early physical transformations of the Nineteenth Century men have been made increasingly uncomfortable by undernourished children, by insecure parents, by unattended sickness. In other words, the conquests of our engineering leaders have made more and more apparent the fact that we have little practical skill in adjusting our social arrangements to new circumstances and that we lack any widely accepted social philosophy in terms of which we can face the possibility of social change. The engineer has greatly reduced the total amount of poverty, but, by this achievement, he has made all poverty appear, not as an act of God or Nature, but as an expression of human clumsiness and inertia.

This lag in the philosophy and practice of social adjustment is not due to the absence from our society of a profession of *social* engineers.<sup>4</sup> Lawyers very clearly constitute such a profession. They are specialists in social arrangements. And in certain superficial respects they may seem to occupy a position analogous to that of the physician and the engineer. Their services are indispensable when one wishes to get into business or out of wedlock or to alter in any of a hundred ways one's relationship to his fellows. In a way the lawyers are an élite. Most of our political leaders are taken from this profession and the technical language of political life is the technical language of law. Yet the public attitude toward the lawyer is very different from that toward the engineer.

It is recognized that the lawyer is a learned man, but there is some doubt as to whether his learning is to be relied upon. It is recognized that the lawyer has a skill and a set of technical concepts that give him a unique social position, but there is little confidence that his outlook and

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4. "Let us think of the problem of the end of law in terms of a great task or great series of tasks of social engineering." POUND, *THE SPIRIT OF THE COMMON LAW* (1921) 195.

philosophy entitle him to be trusted to keep social arrangements abreast of biological and physical possibilities. The engineer who invents the internal combustion engine finds that buggy springs and steel tires are interfering with the development of automotive transportation. He therefore sets about to develop shock absorbers and soft tires. There is little confidence, on the other hand, that lawyers as a group will set to work to alter present laws of ownership and control as soon as they become obstacles to a sensible distribution of goods. It is too often seen that the lawyers are content to justify social changes after they have happened and to deck out innovation in old-fashioned, reassuring words.

The engineer is seen to be a fearless adventurer. On the simple assumption that it is man's destiny constantly to increase his control over nature, he proceeds directly and courageously in the furtherance of that aim. At times his leadership is actually ruthless. He invents a machine which he knows will steal the jobs of thousands of men. He raises the speed of the motor car though he knows that the greater speed will lead an increasing number of men to kill themselves and each other. In short the engineer is a leader whose very carelessness of customary habits and values only emphasizes his social function. He assumes in respect to physical nature that it is never better to let well enough alone. In contrast, the lawyer is typically frightened by social innovation. When he deals with an eight cylinder social machine, such as an interlocking corporation or a trial marriage, he typically considers it his primary duty to paint the engine to look like a horse. In doing so he performs a social function. He permits those who are afraid of engines to continue to believe that they are being drawn by the old gray mare. But he frequently delays the achievement of a frank and thoroughgoing adaptation to the machine.

There is nothing very new about these observations. Since the Eighteenth Century the western world has gradually been assimilating the idea of a progressive conquest over physical and biological nature. Within our own times, early conservatism has given way increasingly to a spirit that welcomes change. Although the first steam trains and the early automobiles were almost more than the placid country-side could stand, the airplane was more easily accepted. Men laughed heartily at the germ theory of disease, but they have accepted the less credible story of the vitamins without a murmur except that of interest. This constant growth in man's control over nature has been called *Progress* and progress has become the central motif of our culture.<sup>5</sup> In such an atmosphere it would have been impossible not to recognize that legal science has imposed a constant drag upon the adventurous spirit of the times.

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5. Becker, *Progress*, 12 ENCYC. SOC. SCI. 495.

Whatever other elements it may contain, the New Deal has sought to popularize the idea that the experimental, fact-dominated, forward-looking view of natural science is relevant to the process of social adjustment. And there is nothing very surprising in the *Literary Digest's* finding that in the spring of 1934 the New Deal was favored by as few lawyers as clergymen. Educators approved of the Roosevelt policies by about 2 to 1, while clergymen approved by 12 to 10 and lawyers by 17 to 15.<sup>6</sup>

#### *The Answer of the Technocrats*

One of the most naive and popular explanations of the lag in social engineering is to be found in the suggestion that social adjustments have been entrusted to the wrong men. The greatest success of the modern world has been its increasing control over physical nature, but we have not given the real engineers who have been responsible for this progress an opportunity to reconstruct our social institutions. There is a certain plausibility to this suggestion, as was demonstrated by the marked, though brief, welcome accorded the technocrats. They assumed that men who have proved themselves able to deal factually with one set of life's conditions ought to be given wider opportunities. They felt that social problems simply need restating in terms of energy transformations.

The technocrats did not seem to realize that it is as unscientific to force human nature into the model of a simple machine as it is to personify an automobile. They were, of course, correct in pointing out that social thinking is frequently blind to plain physical facts and their efforts to emphasize the importance of such facts was wholesome. But as Stuart Chase puts it: Energy economics cannot be taken straight; it needs a "chaser of psychology and anthropology."<sup>7</sup>

The engineer, and the same holds true of the physician, tends to take a scientific attitude only to a limited range of problems. Give him a circuit to design or an engine to test and he will surrender himself completely to the dictation of the facts. But give him a human personality or a set of human relations and he will be as subject as another to the sway of merely plausible and congenial opinions. We must not forget, however, that the lawyer, too, sets aside many of his unscientific habits when he is faced with problems which obviously fall within the realm of natural science. He himself may lack the expert's skill to handle such problems, but he has some grasp upon the philosophy of natural science.

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6. (June 30, 1934) *THE LITERARY DIGEST* 30.

7. A few of the many references on Technocracy are SCOTT AND OTHERS, *INTRODUCTION TO TECHNOCRACY* (1933); BLANSHARD, *TECHNOCRACY AND SOCIALISM* (1933); and CHASE, *TECHNOCRACY: AN INTERPRETATION* (1933).

Although he is willing to test a legal innovation in terms of the emotional adjectives that can aptly be attached to it—by whether it seems more natural to speak of it as *bureaucracy* or as an *intelligent control*—he is less likely to tolerate a similar assessment of the power of a steam engine or the voltage of an electric current.

It thus appears that the world is not divided into scientific people and unscientific people, but rather into groups of problems for which our general culture provides us with a scientific or an unscientific approach. Recent psychological studies indicate that even young children interpret simple physical phenomena in a relatively matter-of-fact manner. Supernaturalism is present in the children's thinking mainly in connection with subjects like the sun and stars that are frequently involved in the fairy stories told them by adults.<sup>8</sup>

We may look to the engineer, then, to observe the effectiveness of the scientific viewpoint in that area where our general culture has accepted that attitude, but we cannot look to the engineer to maintain his professional attitude when he is confronted with problems that fall outside that area. Although he may have been subjected to a rigid training in scientific ways of thinking, the cultural pressure to use other modes of thought in connection with psychological and social problems is continuous throughout his career. He may have an uneasy feeling now and then about the thinking of lawyers and politicians, but they continue to supply him with most of his ideas about human nature. The engineer, when called upon to frame a code of conduct in an industry or to settle a dispute, will, like other men, seize upon the intellectual technique (that is, the legalistic technique) which is most readily available and most generally acceptable in our culture. The principal difference between him and the lawyer is that, as a rule, because of lack of training in meeting problems of this specific type, he is humanistically a good deal more naive.<sup>9</sup> He is inclined to put to literal use outworn formulas which the experienced lawyer uses only with his tongue in his cheek.<sup>10</sup>

#### *The Lawman's Answer*

Few lawyers would accept the not infrequent charge of laymen that legal ways of thinking are fundamentally deceptive and that the legalistic

8. Huang, *Children's Explanations of Strange Phenomena*, 14 *PSYCHOLOGISCHE FORSCHUNG* BD. 14; *SMITH COLLEGE STUDIES IN PSYCHOLOGY* (1930) No. 1.

9. It is sometimes said that science represents a method of inquiry independent of the type of phenomena studied. E.g., 1 PEARSON, *GRAMMAR OF SCIENCE* (3rd ed. London, 1911) 12. But the fact remains that some phenomena, because of our cultural attitudes, seem to invite scientific approach while others resist it.

10. Such is usually true of lay arbitrators. See Phillips, *A Lawyer's Approach to Commercial Arbitration* (1934) 44 *YALE L. J.* 31.

administration of social life rarely serves anything but narrow, professional interest.<sup>11</sup> The men of law would generally agree, however, that as compared with natural science, jurisprudence is vague and uncertain, and that, as compared with the practical activities of the engineer, those of the lawyer are bungling and indecisive. Occasionally we do find a jurist who resents the unfavorable comparison of jurisprudence to natural science and who is inclined to charge the critics of the law either with simple ignorance of legal learning or else with some sinister purpose to undermine respect for law. Such jurists believe that the meaning of the Constitution stands like the Rock of Ages. Unscrupulous men may ignore its strict apportionment of rights and duties; ignorant men may never reach an understanding of its beneficent provisions. There it stands, a proper object for study and veneration, but never an instrument to be used according to the needs of the times. Such jurists also believe that the great mass of judicial decisions making up the common or customary law also contains an intrinsic rationality and truth. Paradoxes and conflicts within this law can all be explained away by industrious study. In our further discussions of the juristic mentality we shall have a good deal to say about this ideal legal science that men struggle to understand. It is a view reminding one of the theological theory that the scriptures contain a perfect body of truth which seems to vary only because our understanding varies. Men who hold such a theory are likely to glory in the very bigness of the law books, their comet-tails of footnotes, and the fact that it is very easy for a competent legal scholar to make any legal problem very hard.

But we need not pause too long over the attitude of these absolutists. We would do better at this point to note the comments of those whose general point of view is more consonant with the times.

The point is often made that though the lawyers may be encumbered with many antiquated conceptions and terms, the development of a genuine science of law has for a long time been under way. Professor Arthur L. Goodhart of Oxford is a brilliant, but essentially contented, student of the law. He is quite willing to reject such a statement as the following from Blackstone: "The judgment, though pronounced or awarded by the judges, is not their determination or sentence, but the determination and sentence of *the law*. It is the conclusion that naturally and regularly follows from the premises of law and fact." But he feels that recent American writers have made too much of the artificiality of such a separation between the judge and his decisions. He tells us that Archdeacon Paley, as early as 1782, saw that the law could be

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11. For a vivid picture of how the law appears to one physician, see Hamilton, *What About the Lawyers?* (Oct., 1931) 163 HARPER'S 542.

approached as a set of facts rather than as a body of self-sufficient logical concepts and relations. And fifty years later, in 1832, the great John Austin also criticized Blackstone's "transcendental" attitude toward law.<sup>12</sup> We might add that Jeremy Bentham wished to found a science of legislation upon psychological actualities. He contended that the law should increase the total of concrete human happiness and that it should cease to serve purely abstract and theoretical rights.<sup>13</sup> Then there was Lord Westbury who pointed out in unambiguous terms the lack of genuine observation and inductive generalization regarding the actual workings of the law.<sup>14</sup> Or we might move somewhat nearer to our own day and show how, in 1897, Judge Holmes of Massachusetts was recommending that students recognize the close articulation between jurisprudence and such a social study as political economy.<sup>15</sup> The implication seems to be, that since legal scholars have known, for so long, the possibility of facing law as a human institution—as a type of human behavior rather than as a system of mediaeval theology—why should anyone continue to make a fuss about the business? If great men of the law have occasionally doffed their hats to scientific method, is not legal learning coming up to all reasonable expectation?

Another answer of the lawmen is that they are not as backward as they seem. Despite the fact that the law in the books is admittedly antiquated, courts and lawyers have discovered multifarious ways of avoiding the literal dictates of the bookish lore. In many jurisdictions it is held that divorce is possible only when one party to a marriage has offended the other and even in that case it is held that only one of the parties can aid in securing the divorce. If both parties have offended, there can be no divorce. If both parties wish rescission of the marriage, rescission becomes impossible. Such rules of course describe a situation which was once reasonably faithful to social facts. Before her economic independence woman was unlikely to bring divorce proceedings unless she was sorely aggrieved. In a day of more fixed and elaborate family life, in a day when a community would look with scorn upon a man who could not retain the allegiance of his wife, there were stronger forces tending to make a partner resist divorce and to attempt to prove

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12. Goodhart, *Some American Interpretations of Law, Modern Theories of Law* (Milford ed. 1933). PALEY, *MORAL AND POLITICAL PHILOSOPHY* (1790) 2, 32, where he gives an account of "The Causes of the Numerous Uncertainties and Difficulties Arising in the Administration of Justice." 2 AUSTIN, *LECTURES ON JURISPRUDENCE* (5th ed. 1911).

13. BENTHAM, *AN INTRODUCTION TO THE PRINCIPLES OF MORALS AND LEGISLATION* (1879).

14. Quoted by Roscoe Pound *Anachronisms in Law* (1921) 3 J. AM. JUDICATURE SOC. 142, from 1 NASH, *LIFE OF LORD WESTBURY* (1888) 191.

15. Holmes, *The Path of the Law* (1897), reprinted in *COLLECTED LEGAL PAPERS* (1921) 167, 195.



his innocence. But economic conditions and moral standards have changed. Though it is hardly typical for modern men and women to seek divorce lightly, the proceeding is rapidly losing its old meanings. When men and women are thoroughly uncongenial they are both more interested in divorce than in proving who is in the wrong. Divorce is increasingly sought as a result of mutual agreement and with no real intention of fixing the blame.<sup>16</sup> Upon the basis of the report of the Bureau of the Census for 1929, Marshall and May conclude that only 11.8 per cent of the actions for divorce were actually contested. Thus the picture of divorce as the outcome of a contest, which one would be impelled to assume from a reading of the law books, turns out to be a "mirage."<sup>17</sup>

But how are contests avoided when doctrine so plainly makes them essential to the process of divorce? One party might be so convinced of his own guilt that he would prefer to forfeit the case rather than to testify in court. If the party against whom the suit is brought should fail to appear, this might be interpreted as a sign of collusion—as a sign that he is voluntarily putting himself in a bad light to facilitate the divorce. But the court is the only party having an interest in this point and by taking the interest lightly it can prevent legal doctrine from interfering with changing marriage customs. Awkwardness upon the side of counsel or litigants or stubbornness upon the side of the court may occasionally block a mutually desired divorce, but in the main the legal institution is able to keep its action abreast of the times without unduly offending the ancient ideals represented by its doctrines.

This discrepancy between the law in action and the law in books is illustrated again and again throughout the legal institution. We find criminal courts, for example, which dispose of large proportions of their cases after the manner of a psychiatric clinic and which put on rituals in celebration of retribution and revenge only when public attention makes them self-conscious.

The conclusion drawn from this situation by many "practical" lawyers is that the cultural lag represented by the law is due to its doctrines. The fact that the courts are constantly having to get around the theories shows that the theories are encumbrances which ought to be discarded. A good starting point would be with the law schools, which tend to keep alive outworn conceptions simply because they provide such plentiful

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16. For a thorough account of marriage and divorce by a lawyer who is also a philosopher see Llewellyn, *Behind the Law of Divorce* (1932) 32 COL. L. REV. 1281, and (1933) 33 COL. L. REV. 248. See also HERBERT, *HOLY DEADLOCK* (1934) (a satire on the law of divorce in England).

17. 1 MARSHALL AND MAY, *THE DIVORCE COURT, MARYLAND*, (1932).

pedagogical fodder. Law students and teachers, it is said, ought to focus their attention upon the law in action, because at this level the law is most frequently in harmony with social reality. Such a viewpoint is naturally congenial to Americans who have always had more respect for the direct action of the practical man than for the perspective of the philosopher.<sup>18</sup>

This ideal of a theoryless law obviously overlooks the fact that men have never been able to escape the influence of theory upon their serious transactions. Men sometimes insist upon keeping their doctrines to themselves, but the doctrines refuse to be kept down. Like the repressed impulses of which the psychiatrist talks, philosophies have all sorts of indirect ways of showing themselves.<sup>19</sup>

The lawyer, or student, who avoids theoretical discussion as impractical is the very person whose judgment is most enslaved by doctrines that need remodelling. "We have too little theory in the law, rather than too much. . . ." <sup>20</sup> This remark, made nearly forty years ago by Judge Holmes of Massachusetts, is even more applicable today. The astounding effectiveness of engineering has come because of a respect on the part of practical men for the achievements of the theoretical physicists and chemists. Who suggests that engineering thought should confine itself to the ideas that are to be discovered in the inarticulate fumbblings of mechanics in their workshops!<sup>21</sup>

#### *Wanted: A Philosophy*

When one compares social engineering as practiced by the lawyer with the biological engineering of the physician and with the physical engineering of the engineer himself, one does not, as a matter of fact, discover any lack of immediate and practical sagacity upon the lawyer's part. So long as we keep our minds off the larger purposes of social life we

18. Jerome Frank, *Why Not a Clinical Lawyer-School?* (1933) 81 U. OF PA. L. REV. 907 has stressed the use that should be made of the "law in action" in the education of the law student. But he is not so naive as to suppose that practical contact with the courts will give the law student an adequate juristic philosophy. That end he would obtain by admitting into the law schools such history, anthropology, and psychology as is necessary for our understanding of law as human behavior.

19. Yntema, *Legal Science and Reform* (1934) 34 COL. L. REV. 207 has criticised in some detail the idea that common sense is an adequate basis for legal reform.

20. Holmes, *The Path of the Law*, reprinted in COLLECTED LEGAL PAPERS (1921) 167, 198. On the present need of legal philosophy, see POUND, AN INTRODUCTION TO THE PHILOSOPHY OF LAW (1925) c. 1.

21. That modern physical science upon which engineering is based represents an intellectual revolution rather than a mere refinement of the physical techniques of plain men is shown clearly in WHITEHEAD, SCIENCE AND THE MODERN WORLD (1925); BURTT, THE METAPHYSICAL FOUNDATIONS OF MODERN PHYSICAL SCIENCE (1932); NORTHERP, SCIENCE AND FIRST PRINCIPLES (1931) and in many other recent studies of the philosophy of science.

are not conscious that law is a cultural laggard. Granted the aims of the undertakings, there is little to complain about in the capacity of legal skill to weave a gauze of gentle words about the character of a defendant, to tangle a corporation so that inquisitors shall not know where to lay hold of it, or from the bench and in another mood, to deal out fines and phrases to the immediate satisfaction of the community.

The most important distinction between the man of law and the man of natural science is that the jurist is philosophically lost. Living in the constant presence of scientific achievement, he feels and is influenced by the pull of fact. At the same time he has a curious sense of loyalty to political and moral ideas that are supposed to be independent of the world as science knows it.<sup>22</sup>

When physicians first realized that they could assuage the pain of childbirth by the administration of an anaesthetic, they were confused. They still felt that their scientific ideas should not be allowed to contradict their moral ideas and they had told themselves for a long time that the agonies of childbirth had a moral sanction. In medicine, the old philosophy went down before the obvious dictation of the natural facts, because medicine was rapidly reforming its philosophy and setting aside ideas of sin and retribution.<sup>23</sup> But in the law, conflicts of this type are more persistent and more numerous and the facts are much easier to ignore. At one moment we find the man of law apparently living by the philosophy of natural science. Where parental authority insists upon faith-healing for a suffering child, the jurist may find no difficulty in abrogating ancient parental prerogatives and in turning the child over to the doctors. In the next moment, however, we are apt to find his practical behavior directed by tribal customs and superstitions that are clearly in conflict with scientific ways of thinking.

When a life must go out, the man of science has the clear aim to make the transition easy. The man of law, however, feels impelled to conduct an execution in a painful, ceremonial atmosphere with a victim who is sane and sober. He is unwilling or unable to escape the ancient myth that the murderer is making payment of a debt. He may, as a man, be

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22. One of the best illustrations of the confusion resulting from an attempt to deal in purely juristic terms with an essentially scientific problem is to be found in the cases involving the basic radio patents. At the present moment we find a clear division upon a technical, scientific issue between the United States Supreme Court and the highest scientific body in the radio world. See McCormack, *The Regenerative Circuit Litigation* (1934) 5 AIR L. REV. 282. The difficulty here does not grow out of a rivalry between scientific and juristic concepts, but out of a belief upon the part of the lawmen that there is a "purely legal" issue here which is separable from the scientific issue.

23. GORDON, SIR JAMES YOUNG SIMPSON AND CHLOROFORM (1897) c. VII, and THOMS, *Walter Channing and Etherization in Childbirth* (Aug. 1930) 20 AM. J. OF OBSTETRICS AND GYNECOLOGY 244.

willing to turn away his head while some irresponsible official comforts the victim with prayers and chicken dinners, but the jurist does not know how to enter this transaction in his books.

There are those who believe that the legal institution would be rid of embarrassing conflicts if only its ancient mythology could be set aside. Still, something more than that is required. The intellectual embarrassments pervading the law today are not due simply to the antiquity of the conceptions of jurisprudence. The difficulty arises rather out of the fact that, living in a world in which the power of scientific ways of thinking is constantly growing, the man of law simply cannot keep clear of psychological and sociological ideas. On the other hand, he is stubborn about accepting those ideas as more than tools to be used when convenient. He feels that his fundamental aims can still be satisfactorily dictated by philosophical conceptions that somehow stand above or apart from the conceptions of natural science.

When we look back over intellectual history since the dawn of modern science, we see that scientific thought has rarely accepted such arbitrary confinement. Theologians and jurists have from the first had a notion that the view of man and nature provided by the natural scientists could be kept in check, that it could be made a mere technique of achieving ends selected by superscientific forms of reasoning. Yet, as the years have gone on, we have seen theological and juristic doctrines being slowly worn down and disfigured by the very intellectual instrument that was supposed to be used for their own purposes. The nonscientific mind, instead of gaining increasing control over nature by the mastery of the scientific method, has found itself thrown into utter confusion.

Men talking about rugged individualism when they ought to be building houses and distributing goods, men talking about lawlessness when they ought to be expanding the schools and training more teachers, men talking about war as a sin when they ought to be wrestling with the concrete sources of the emotions that make for war: these are the typical outcomes of the prevailing social philosophy, of the philosophy that dominates the law, of the philosophy that would subordinate the pursuit of truth and fact to the pursuit of so-called ideals.

Today men watch with apprehension their own increasing mastery over physical nature. They have the uneasy feeling that they are producing the machines that must sooner or later be used by themselves to destroy themselves. They grow morally earnest about the situation and write articles for the magazines. But too rarely do they bring to bear upon this great social problem that intellectual integrity, that frankness, that cool perspective of nature which has built the machines of war and which is man's only hope in the control of himself. Solemn men who go about the world preaching that there is something more to be relied

upon than facts, that there is something more necessary to human life than intellectual honesty, are doing what they can to prevent the world from catching up with science.

It is true that Jeremy Bentham saw this one hundred years ago, but the present state of affairs does not prove that Bentham's idea of a scientific humanitarianism was impossible. It simply proves that Bentham was more than a hundred years ahead of his time and that the vested interest in other than scientific views of nature were still too strong. One must admit that most of the social reform that has come since Bentham's day has been guided by biological, psychological, and sociological standards—by the quest for concrete and observable types of health and happiness. The professional philosophers may have proved to their own satisfaction that health is only relative, that nobody can know whether he is happy, and such ideas may have been of great aid to those who wished to block all active enterprises of social control.<sup>24</sup> But it is fair to ask how much the world has gained by the insistence upon these moral qualities like piety, justice, patriotism, which have an existence and glory over and above that of physical health and a sound, serene mind.<sup>25</sup> There is no difficulty about such terms so long as they are applied to acts and states that are valued for other reasons than their names. But too often the names are used simply to make men do and be what otherwise they would avoid. One sometimes wonders whether we should not be better off one hundred or five hundred years from now if we could set out with the simple objective of a maximum of bodily health for the population of the world. War could not be tolerated because it brings death and disease, economic uncertainty could not be tolerated because worry, besides being a disease itself, brings other diseases in its train.

If, then, the man of law is to escape from his present confusion, he has to choose between a philosophy completely dominated by tradition and one made congruous with modern, natural science. Actually the first alternative is not available and will not be available unless war or other large-scale disaster shall drive man into a period of intellectual paralysis. So long as the scientific way of thinking dominates engineering and medicine, the lawmen will find it impossible to confine their own philosophy to a logic-tight compartment. So long as science by its concrete achievements goes on schooling plain men in its fundamental concepts, these plain men will become less and less tolerant of ideas that are incongruous with natural science.

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24. For a summary of the arguments against happiness as a social end, see I VENCIGRADOFF, *OUTLINES OF HISTORICAL JURISPRUDENCE* (1920) c. II.

25. Bentham saw clearly how such terms are used to divert the issue from the underlying facts. See BENTHAM, *THE THEORY OF LEGISLATION* (Ogden ed. 1931) xi-xiii.

The second alternative alone is reasonable. If men are to be given some confidence in their enterprises of social control, they must be provided with a social philosophy which they can accept without rejecting that philosophy of physical and biological nature that has taken such uncompromising possession of their minds. The task is not an easy one. It involves much more than the debunking of traditional legal theory. The required philosophy is not something that will spontaneously develop out of common sense, once the world is cleared of magic and superstition. Nor is such a philosophy to be confused with the futile declaration that all social phenomena are nothing more than energy transformations. The cool, clean winds of skepticism must be given an entrance into legal thinking; the naive social techniques of plain men must, so far as they are valid, be accorded frank recognition by the learned; and the established natural sciences must be scoured for facts and concepts applicable to law. But more than this, there must be continuous constructive effort to solve legal problems by the use of the method and viewpoint of natural science.

#### *A Revolution of Ideas*

The many jurists, and laymen too, who feel that we shall be able to solve social problems when we get around to it—that we are already progressing surely if slowly—fail to see the enormous chasm separating the thinking of natural science from that of social philosophy and law. Before the dawn of modern science there must have been many sophisticated men who felt that satisfactory progress was being made in conquest of the physical world and who would have argued vigorously to protect the existing theories of nature. Yet we see now that the technical equipment of modern life could never have been produced through the simple addition to the knowledge of the ancients of a few new items of information. Nothing short of an intellectual revolution could have prepared the way for engineering and medicine as we know them. It was not the superficial notions that needed changing so much as it was the deep-seated and emotional attitudes. Man had to accept a new universe in which his world was an incidental speck instead of the focal point. He had to take seriously and thoughtfully common mechanisms like wheels and levers and falling bodies, which he had thought he had always understood. He had to bring himself to violate sacred taboos by prodding into the dead bodies of human beings. In short, modern natural science required the radical revision of a culture.

When we are assured that the present rate of change in social and legal thinking is all that should be expected, it is fair to remind ourselves that in the world of ideas as well as in the world of government there are *mere* changes and there are revolutions. It is fair that we should ex-

amine the present uneasiness in social thinking in order to estimate whether that painless progress so much advocated by those who are well satisfied with prevailing ideas is actually touching the dilemma of our times. Let us remember again what that dilemma is. On the one hand man's faith in the natural scientist is rapidly increasing as he sees the scientist's ever-increasing control over the biological and physical world. On the other hand, men's faith in social control, in law and in the ideas that lie behind the law, is clearly faltering. The better acquainted men become with the engineer and the physician, the more skeptical they feel about the ideas of statesmen, jurists, and politicians. There is a spreading uneasiness regarding statesmen who talk about the payment of international debts which obviously cannot be paid, regarding jurists who talk about law as though it were independent of human nature, and regarding politicians who become engrossed in the application of elastic words like *bureaucracy* and *liberty* when they might be concerned about definite social adjustments. Gradually it is dawning upon the world that the fundamental difference between the man of law and the man of science lies in their sense of responsibility to fact.

The notion is gaining common circulation that we might do well to transfer to our social problems that type of fidelity to fact which in other realms has been so profitable. But such a transfer is a serious matter. Social philosophy of today, like the natural philosophy of the mediaeval churchman, is more than a collection of facts and principles to which the scientific method will merely need to make additions and corrections. The entire outlook of the philosophy needs to be changed. Such a venerable distinction as that between moral and natural causes will have to be uprooted. It will be necessary to realize that the coolest calculation of a criminal is as much a natural phenomenon as is the convulsion of the epileptic.<sup>26</sup> It will be necessary to set aside the question as to who is deserving of our hatred and of substituting the question as to what, as a matter of fact, can be done to increase our control over human behavior.

The idea that every man (or almost every man) lives as he wishes in a world of his own choosing which he may leave or return to upon his own volition will have to be replaced by an adequate understanding of the actual relationships between the individual and his social environment. For natural science both individualism and blameworthiness as usually understood are not simply unproved hypotheses—they are fictions which are in such flagrant contradiction to the facts that they are a constant barrier to clear thinking about social problems.

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26. The conceptual machinery with which the law attempts to handle the criminal is about two hundred years behind the modern science of criminology. See, for example, GAULT, *CRIMINOLOGY* (1932) c. II, and HAGERTY, *TWENTIETH CENTURY CRIME—EIGHTEENTH CENTURY METHODS OF CONTROL* (1934).

Obviously no such revolution has yet taken place. Our technique of social control is largely dominated by a theory of independent agents making free choices in a moral world. Even in the case of international law and negotiation there is the underlying assumption that large political groups have the power to make choices between good and evil and that such groups are susceptible to the threat of being blamed for bad behavior. It may be fair to ask, therefore, what reason there is to discuss a revolution that would have to wrench loose such solidly established ideas and attitudes.

The answer is simply this: Throughout Europe and America men are becoming increasingly conscious of the inadequacy of prevailing social philosophy as a guide to the practical problems of social control. Karl Marx and Jeremy Bentham saw a century ago that such control would ultimately have to rely upon the sense of fact that dominates natural science.<sup>27</sup> Throughout the Nineteenth Century and up until the present day there have been scholars who have demonstrated with ever-increasing conviction the possibility of applying the scientific method to history, politics, and economics. But the influence of the scholars has thus far been limited. The sociologist has given us a solid factual foundation for the understanding and control of that pathological phenomenon, "the gang," but as yet there has been no widespread and serious effort to deal with this problem except in terms of the conventional techniques by means of which we try to frighten potential public enemies. Nevertheless, the sphere of influence of the scholar is gradually widening. Even the barber, while cutting one's hair, gives a Tugwellian lecture upon the futility of trying to starve our way to prosperity in a world of plenty. Everywhere one finds plain men who see that the old social theories have little to do with facts and needs.

Now this is exactly the setting for a revolution. The old ideas seem still to be in the saddle. Even where as a matter of social practice we have come to act in response to the facts, the old formulas have to be stretched to fit. But there is a limit to the stretching. Men may be relied upon to act one way and to talk another only until they discover a more honest way of talking. They may be relied upon to maintain the old verbal customs only so long as those customs do not present a definite barrier to their aspirations. When they become aware of a philosophy which will permit them to speak frankly and directly, the adoption of this new way of thinking is likely to come abruptly.

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27. It is sometimes said that Marx and Bentham are to be discounted because their views of science were oversimplified. But this was only because they accepted the general theory of the natural science of their time. Their fundamental idea that social philosophy should be consistent with natural science has not met refutation.



*The Fly-Wheel of Society*

Change of any kind in human life is opposed by the inertia of habit. "Habit," said William James, "is thus the enormous fly-wheel of society, its most precious conservative agent. It alone is what keeps us all within the bounds of ordinance, and saves the children of fortune from the envious uprisings of the poor. It alone prevents the hardest and most repulsive walks of life from being deserted by those brought up to tread therein. It keeps the fisherman and the deckhand at sea through the winter; it holds the miner in his darkness, and nails the countryman to his log-cabin and his lonely farm through all the months of snow; it prevents us from invasion by the natives of the desert and from the frozen zone. It dooms us all to fight out the battle of life upon the lines of our nurture or our early choice, and to make the best of a pursuit that disagrees, because there is no other for which we are fitted, and it is too late to begin again. It keeps different social strata from mixing. Already at the age of twenty-five you see the professional mannerism settling down on the young commercial traveler, on the young doctor, on the young minister, on the young counsellor-at-law. You see the little lines of cleavage running through the character, the tricks of thought, the prejudices, the ways of the 'shop' in a word, from which the man can by-and-by no more escape than his coat sleeve can suddenly fall into a new set of folds. On the whole, it is best that he should not escape. It is well for the world that in most of us, by the age of thirty, the character has set like plaster, and will never soften again."<sup>28</sup>

There is no doubt about this safety factor in the inertia of habit. The anthropologists have described social catastrophies brought about by the too sudden changing of the habits of a people.<sup>29</sup> It might seem therefore that all radical changes in behavior or in intellectual outlook are fraught with danger and that the only sane way to handle changes that are inevitable is to prevent their occurring too swiftly. It might seem always the part of wisdom to turn threatened revolution into benign evolution.

The belief that the best protection against the shock of social change lies in the tactics of conservatism is widely held and widely represented in political and in educational practice. But the difficulty with this belief is that it considers every social change as something to be dealt with as an isolated phenomenon. It assumes that the sudden legislative relief of farm debtors must have been hard upon the characters of the farmers. There was general recognition that something had to be done for the agricultural debtor, but there was a feeling that, whatever was done, it

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28. 1 JAMES, PRINCIPLES OF PSYCHOLOGY 121. Quoted by permission of the publisher, Henry Holt and Company.

29. See PITT-RIVERS, THE CLASH OF CULTURES, (London, 1927).

must not change the debtor's status too suddenly. In dealing with the bankrupt farmer it was felt that we ought to remember what happened when the white man suddenly bestowed fire water upon his red brother.

It is clear that legal steps taken during nineteen thirty-three and thirty-four have altered radically the lines of financial relationship between the productive groups in our population. There is the possibility that a whole series of social maladjustments may follow. Our present point, however, is simply this: the sheer speed of these changes is no criterion of their desirability or undesirability. The speed with which mortgage moratoria and agricultural bonuses were adopted must be evaluated in terms of the speed with which other social changes were taking place. How rapidly and completely were the industrial producers losing their markets because of the collapse in the financial status of the farmer? How rapidly was the farmer losing his loyalty to established political institutions? Such questions as these must be brought into view when one considers whether in a given case it would have been better slowly to have worn down the resistance of habit or whether it was, after all, necessary, considering what other uncontrollable changes were taking place, to have torn up a few habits by the roots.

We may look upon the intellectual habits of a people as though they represented a military line on the defensive. So long as there is an orderly retreat in the face of slow but even pressure, little harm is done. This is the picture the conservative likes to draw of our relinquishment of old customs. But if the pressure upon one part of the line brings about a pronounced retreat at that point, failure of the remainder of the line to fall back creates the gravest danger. The more stubbornly the forward segment maintains its position, the more likelihood there is that the whole line will become broken and disorganized. Resistance itself is no longer a safety factor.

Now the onrush of modern natural science has had a devastating effect upon our habitual ways of looking at the physical and even the biological world. Unless we go back and read the natural histories of the ancients it is difficult to realize how many long-established intellectual habits had to be given up before the advance of modern science. But there is a stretch of the cultural line where resistance still is very stubborn. Although we have given up the theory that cursing at a broken machine or a sick horse does any good, it is still a prevailing habit to assume that the economic policies of nations, the business practices of bankers, and the aggressions of gangsters can be brought under control by such tactics. Our present culture presents to its environment a broken line. If the natural sciences should lose their present influence, if we could return superstition, animism, spiritualism and other primitive attitudes to their former dominant position, we might restore some sort of equilibrium.

This is the move suggested by those who believe that farmers should return to nonmechanical production and that we can best preserve our old ideas about distributing goods by keeping down the amount that we have to distribute. Another possibility is that the gap between scientific and social thinking will lead inevitably to a collapse of our civilization. This is the lugubrious prediction of some observers who cannot conceive of our ever attaining a fact-minded attitude toward social phenomena and who also feel that we shall not be able to prevent the physical sciences from creating insoluble social problems. But there is the third possibility that the highly resistant habits of social interpretation will give ground suddenly, thus creating a new alignment of ideas. Certainly such a retreat from the old ways of thinking is greatly to be desired and should not be resisted simply upon the grounds that habits ought always to be changed slowly. In this case the very integrity of society may depend upon a change that is swift and decisive.<sup>30</sup>

#### *A Vested Interest in the Old Ideas*

The general line of cleavage between social philosophy and the philosophy of natural science reaches down, as we have seen, into the mentality of common men and children. Yet the more intricate elaboration and the more difficult application of these philosophies is in the hands of special groups of men. The lawyers, whether judges, counsellors or scholars, represent the dominant social philosophy of our day. When, therefore, we consider the possibility of radical changes in social philosophy, we must look at the lawmen and consider whether, as men go, they are conservative or progressive.

The general verdict is clear. Central to all their doctrines is the principle that habit and custom are the most valid criteria of truth.<sup>31</sup> There are dissenters, of course, who believe that legal thinking should spend more time looking forward to social results and less time looking backward upon the precedents, but there is no question about the dominance of the retrospective view. Around this type of interpretation there has grown up a tremendous literature of past decisions in the use of which the neophyte is drilled. In such a formula, in such a literature, and in such a process of initiation the lawcraft has naturally developed

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30. That the violent social disturbances associated with political revolution have been due to the stubborn defense of outworn ideas and customs is well developed by ADAMS, *THEORY OF SOCIAL REVOLUTIONS* (1913), and by SOULE, *THE COMING AMERICAN REVOLUTION* (1934).

31. It is sometimes said that the conservatism of the lawyer is largely due to the fact that much of his effort is expended in protecting men of property. See WILLIAMS, *PRINCIPLES OF SOCIAL PSYCHOLOGY* (1922) c. XVI. But the hold of custom upon thought is certainly based upon something far more fundamental than the position of a social class.

a vested interest. When the suggestion is made that legal problems are at bottom problems of psychology, sociology, or economics and that the law student ought to be trained to analyze social situations in such terms, the lawman smiles sadly and says that too little time is now available for the mastery of the "regular" technique of the profession. He means, of course, that there can never be anything quite so important about a social problem as what John Marshall would have thought about it had he met the situation a hundred years ago. How the problem might look when viewed in terms of recent psychological, sociological, or economic investigation is conceived to be merely a secondary question.<sup>32</sup>

The lawyers are a priesthood with a prestige to maintain. They must have a set of doctrines that do not threaten to melt away with the advances of psychological and social science. It is desirable for them to maintain a logic that seems to the laymen subtle and difficult to grasp. They must, in order to feel socially secure, believe and convince the outside world that they have peculiar techniques requiring long study to master. In a way they have overplayed this card. Even laymen are coming to see that if *The Law* were as difficult to understand as the profession implies, nobody would ever be able to become a lawyer.

There is nothing immoral or insincere about this tendency of legal theory to support the status of the legal profession. It has been typical of priestly and professional groups throughout human history to emphasize the uniqueness and importance of their knowledge. Recognition upon the part of the priests and professionals that theirs is an intellectual policy of deception and mystification has probably been rare. As a rule the sense of fidelity to fact is simply a minor factor in such situations. We should hardly expect the young magician or medicine man to question the factual validity of the rituals and incantations he is taught. It is enough if he catch the dramatic congruity of his role with the larger life of the community. Indeed, if we go back only a few years in the history of modern medicine we shall find much the same psychological

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32. ". . . It is doubtless of the utmost importance to know the actual conditions under which a legal rule is to be applied. But it cannot be too strongly insisted that the knowledge of such social conditions belongs to economics, or to some branch of descriptive social science. Law is a method of regulating social action, and the science of law has a content over and above that met in the knowledge of actual conditions." Morris Cohen, *Law and the Scientific Method*, LAW AND THE SOCIAL ORDER (1933) 184, 189. See also (1928) 6 AM. L. REV. 231. Obviously law is not identical with economics, sociology, or psychology, but insistence upon its *over-and-aboveness* has tended to insulate it from those very facts most needed in the design of effective social control.

Even an essentially liberal jurist like Professor Hessel E. Yntema seems to accept conventional legal scholarship as a "practical" obligation which leaves little energy for the factual investigation of human disputes. Yntema, *Legal Science and Reform* (1934) 34 COL. L. REV. 207, at 220.

phenomenon. Drugs and surgical procedures that we now know could not have cured disease were used by generation after generation of physicians. The technique of blood-letting, for instance, was a long established symbol of doctoral behavior. The public expected it, and the doctors had elaborate theories to explain its efficacy. That bleeding, together with its largely erroneous theories, should have survived so long was due, not to the fact that the doctors were fooling the public in order to make a living, but because of certain dramatic congruities that were being maintained. There was something altogether fitting about a doctor opening a blood vessel and this fitness was as welcome to a public that had a desperate craving to believe in doctors as it was to the doctors themselves.

When we take a psychological rather than a moral view of the legal profession, we are able to understand why lawyers, who are, as a rule, as honest as other men, can develop and maintain theories of social control that are so largely lacking in factual validity. Recall, for example, the notion that even large minorities can be made to obey laws they do not like until a majority of votes can be obtained for repeal. The theory has almost nothing to do with the democratic process as it has actually operated and there is almost no reason to believe that democracies will ever operate that way. Or consider the theory that the courts are at the service of the people. Actually, of course, the courts are available in proportion to one's ability to pay for their use, but legal theory has little to say about this stark reality.<sup>33</sup> Nevertheless these doctrines give a certain dramatic congruity to legal and political life which has an obvious appeal to the public as well as to the lawyers. If their factual validity is attacked, many lawyers will rush to their defense. Some will say shamelessly that the theories are not intended to be accounts of fact. They are rather the expression of ideals and hopes. Psychologically their appeal is akin to that of the wild dancing and drum-beating by means of which the primitive doctor seeks to drive away the evil spirits inhabiting the sick, or the dark-colored and evil-smelling concoctions with which other physicians have sought to accomplish the same result. When people are terribly depressed by the suffering of their kin, the first urge is that something vigorous be done and the first test of the fitness of what is done is almost sure to lie at the level of emotional satisfaction. In the present state of political and legal thinking, it is far more necessary to say something that is emotionally satisfying than something that is true.

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33. The lawmen know that the courts are accessible only to those able to bear the expense of litigation, but legal theory treats this fact as an unfortunate accident rather than a fundamental characteristic of the legal institution. Reform is thus rendered more difficult.

In short, the lawyers constitute a conservative force balking the advance of social thinking. This conservatism appears in the dominant theme of the law—in the principle that the concurrence of a judge with his predecessors is a direct test of the validity of his decision. No one would question the value of historical knowledge in the solution of social problems, but the doctrine of precedent in law is something more than a responsibility to history. It is a custom, not only of knowing what others have thought, but also of thinking that way oneself. It is a habit of mind in which a stupidity may be perpetuated on the grounds that it is well-established.

In an age when man's thought is constantly turned toward the future by the clear promises of change offered by natural science, it may seem remarkable that legal thinking should have maintained an essentially conservative logic. One factor in this conservatism has been the association between legal doctrine and the status of a social group. In general the better organized and the more self-conscious a professional group becomes, the more resistant it becomes to new ways of thinking. If it is admitted that psychology and sociology are as important as is legal custom in the administration of criminal justice, it becomes apparent that the conventionally trained lawyer is in danger of losing a privileged position. One remembers how at one time conventional medicine was so resistant to the intrusion of surgery that the latter had to be developed as a separate profession.

Finally, it is worth noting that the public itself has other impulses than that of being right in the scientific sense. The public has some liking for a law that expresses hopes and ideals, even if these be unrealizable. As we have earlier remarked, the lawyers probably overestimate the demand for merely emotional congruities, just as the theologians long overestimated the desire upon the part of laymen to believe in miracles. Nevertheless this fear upon the part of the lawyers of departing too abruptly from popular impulses is one of the powerful elements in maintaining legal conservatism.

#### *The Arguments of Conservatism*

It has become a commonplace of everyday thinking that the psychological forces which determine the side we are to take in an argument are not identical with the reasons we advance in favor of our position. There are the *real* reasons and the *good* reasons. When we speak of the habitual logic of the lawyers, of their desire to maintain their priestly status, and of their sense of obligation to other values than that of truth, we are not repeating arguments advanced by the lawyers themselves. It would never do for a group to say that it is conservative because it is

used to being so, or that it is afraid to offend popular opinion, even when that opinion is manifestly wrong. Yet juristic conservatism has been under vigorous attack from within and without the profession and there has been a necessity for argumentative resistance.

The first argument of conservatism is that truth about society and social institutions is likely to be disconcerting and even dangerous. Unvarnished facts ought not be presented without consideration of their psychological effects upon the people.

When one applies the attitude of natural science to an area previously dominated by merely plausible and authoritarian doctrines, the first effect is typically destructive. It is frequently impossible to develop a valid interpretation of a social problem until old doctrines have been undermined. In a fact-minded study of the law it may be necessary to show that a jury trial is primarily a resolution of an emotional conflict—that it is concerned only secondarily with the fitting of the law to the facts. Similarly it may be necessary to show that the ablest judges are only human beings and that, despite our yearning for a superhuman justice, laws are never expressed except through men. Such critical conclusions are actually disturbing to the student and the practitioner who are bent upon knowing *what the law really is*. And, if such persons accept these critical conclusions they are likely, at least for a time, to feel baffled and skeptical about the entire legal institution. One charge against the application of scientific method to the study of social control is, then, that it tends, if too vigorously pursued, to lead to skepticism.

We all remember how, a generation ago, there was a good deal of nervousness about the influence of philosophical and biological study upon religious beliefs and we all remember that there frequently was a period of disturbance for the boy brought up in orthodox surroundings and then suddenly introduced to the theory of evolution. But the men of science did not go easy on their students. Instead the religious influences became altered. Students are today less shocked by science because they no longer are inculcated with theological beliefs which have to be uprooted. We may conclude that the development of legal study will probably follow a similar course. Criticism of old beliefs in terms of the facts will hardly be restricted. Instead, this criticism will become such an established part of legal education and of popular ideas of social engineering, that it will no longer be disturbing.

It is a basic tenet of the scientific mode of life that the truth is always to be pursued and expressed without regard to the comfort of those who have found security in fictions. That the universe was made expressly for man seemed less plausible after the Copernican theory had shown that the earth is not at the center even of the solar system. And in those days earnest men who accepted the new astronomical theory were

troubled by its possible effects upon the public at large. Some three hundred years later other earnest men saw a serious problem in the possible influence of the theory of evolution. There seemed to be no small likelihood that such a theory would unsettle established religious beliefs. In our own day the Freudian theory with its insistence upon the dominating and ubiquitous character of the sexual impulse has again caused men to wonder whether the new knowledge may not destroy indispensable fictions. But in all of these cases science has pressed onward. It has been a part of the scientific movement to restrain the misinterpretation of new facts, but never to restrain the collection and dissemination of the facts themselves. And it is significant that in the modern world this fearlessness on the part of science as to the consequences of new knowledge has always prevailed.

That the body of legal opinion is still essentially resistant to a thoroughgoing scientific attack upon the problems of social control is nowhere clearer than in the failure of the law men to accept the principle that discovery of the truth is the main objective of thinking and that a fiction is never to be regarded as better than a fact. There is a widespread feeling among the general public that law ought to be definite and that its application ought to be swift and certain.<sup>34</sup> Now every lawyer knows that the law is far less definite than laymen believe and that its pitfalls are so many that lawyers can ill afford to run the risks of speed. The scientific approach to such a situation would require further open-minded inquiry into the types and sources of legal uncertainty and contradiction and the widespread dissemination of the factual results. The public sometimes likes to think that the courts are logical if only one understands them well enough. There is a popular belief also shared by many jurists that past decisions on a point of law must fit into a logical pattern. Yet one of the most obvious and psychologically most understandable conclusions to be drawn from any mass of decisions upon a reasonably subtle point is that the judges are constantly contradicting themselves and each other. The white men were often shocked to find that the American Indian was willing to take on the Christian Religion without discarding his own. According to a certain kind of so-called logic there seems to be an impossibility about the holding of contradictory beliefs, but psychologically there is nothing more easily understood. Every normal person harbors contradictory beliefs and desires without ever making final settlement of the issue between them. Similarly it is perfectly natural that a judge should now decide a case in this way and then reverse himself under insignificant changes in sur-

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34. This is what Jerome Frank calls the "basic myth" of the law. See FRANK, *LAW AND THE MODERN MIND* (1930) 3.



rounding circumstances. When we consider groups of judges, such contradictions are even more to be expected. Freud has emphasized the long established fact that the inner life of the individual is always full of conflict and contradiction and that we can deal with psychological problems only by admitting this fact. A scientific approach to law would admit that such a complex institution as the law is also full of normal conflicts and that the competent understanding and use of the law will be dependent upon an understanding of the nature of the conflicts within it.

But such an attitude is intolerable to many of the legal profession. When directly confronted with the fact that the law does not operate logically, these members of the profession will admit conflict and contradiction but say that it is not as important as the law's consistency. Such, however, is not the point. Of course the judges sometimes agree. Probably they agree more often than not. But their disagreements constitute one of their most important types of behavior. They are more than accidents that merely have to be explained away. If it were not for the reality of the disagreements there would be no appellate courts and little of what today goes under the name of legal learning.<sup>35</sup>

The unwillingness of the lawmen to face the fact of conflict within their institution is well illustrated by the philosophy behind one of the most ambitious and costly professional efforts of modern times. Weighted down by the obligation to make the law as certain as laymen and naive practitioners wish to have it, an imposing group of legal experts met in Washington in 1923 and organized the American Law Institute. It was the design of this Institute to foster the codification by expert committees of the principal chapters of that law which according to Anglo-American theory is supposed to reside in the accumulated decisions of the courts. If a batch of cases should seem to point in two or more directions it was planned that the experts should themselves decide *what the law really is*. They were not to publish argumentative support for their conclusions since that might again resurrect the very uncertainty which the Institute was seeking to squelch. In other words an effort was to be made to take the cases—one of the finest existing records of that fickle creature, man—and to remake them into a logical system within

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35. There is obviously little use in debating the question as to whether legal rules are or are not certain. Some are relatively certain; others are relatively uncertain. But legal theory is too inclined to hold that uncertainty is an accident rather than a fundamental feature of the law. How many law students are frankly taught that uncertainty in the rules as well as in the facts is practically a prerequisite for litigation? See Dickinson, *Legal Rules, Their Function in the Process of Decision* (1931) 79 U. of Pa. L. Rev. 833, 1052.

the reach of the average intelligence of average lawyers.<sup>36</sup> Actually the result thus far secured is hideously difficult. There is some reason to believe that it would be easier and more satisfactory to learn law by random sampling of the cases with all their contradictions and complexities than by reading the abstract propositions in the volumes issued by the Institute.<sup>37</sup>

Our main interest, however, is in the general philosophy of the undertaking, which is plainly founded upon the belief that too much truth about the law is disastrously confusing and that the remedy may be found in an authoritative suppression of the facts rather than in better education of the public and the bar as to the actual psychological and sociological nature of the law. Religious teachers thought that men would find it simpler to lead a good life if they were given a mythical picture of human nature—if they were told, for instance, that good men do not even think about sensuous pleasures. And so the American Law Institute has thought that it can help simple-minded lawyers by giving an artificial and arbitrary picture of the principles in terms of which human disputes are supposed to be settled. No one could have expressed the position better than Chief Justice Hughes (who in many other respects is not rockbound). Replying to critics of the undertaking,<sup>38</sup> the learned Justice spoke as follows:

“. . . The law is not an end in itself; it does not exist simply for the play of wits. The law governs the relations of men and women in an ordered society. They are entitled, so far as is humanly possible, to know the rules that govern them and to have these rules applied consistently. Clarity and certainty are thus desirable ends, but they cannot be attained even measurably without cooperative efforts, in and out of courts, which seek to develop a coherent jurisprudence. The authority of the Institute is the authority of a cooperative effort of the most intelligent and expert sort. It stands opposed to mere impressionism. The Restatement will foster analysis rather than displace it. It will promote examination of principles, rather than discourage it. It will tend to diminish the careless use of digests and cyclopedias. Focussing attention on definite propositions, it cannot fail to facilitate discussion and improvement.”<sup>39</sup>

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36. “The American Law Institute, organized at Washington in 1923, is the first cooperative endeavor by all the groups engaged in the development of law to grapple with the monster of uncertainty and slay him.” CARDOZO, *THE GROWTH OF THE LAW* (1924) 6.

37. The first volumes of the restatement of the common law to be completed were those on Contracts published by American Law Institute Publishers, 1932. Torts, Conflict of Laws, Property, Business Associations, Trusts, and Criminal Procedure are in various stages of completion.

38. Clark, *The Restatement of the Law of Contracts* (1933) 42 *YALE L. J.* 643. Another skeptical reviewer is Pollock, Book Review (1933) 47 *HARV. L. REV.* 363.

39. Chief Justice Hughes, (1933) *A. B. A. J.* 325, 326.

The attitude is definite. Law is more than something to be honest about. It is something to live by. A feeling of certainty and clarity is worth achieving even if it calls for an authoritative forgetting of human disagreements. Legal analysis is not to be hindered by the new code, but such analysis will be better if carried on deductively. What is primarily needed as a basis for analysis is a set of definite and coherent propositions.<sup>40</sup>

We would not suggest that a sound knowledge of the law can be built up without the tentative and exploratory use of general propositions. There remains, however, the essential question as to the test to which these propositions are to be submitted. In natural science it is held that a good hypothesis must be definite as to the fact-knowledge required to support or refute it. The scientific hypothesis is not designed to comfort uncertain minds or to achieve conviction by authoritarian sanction. It aims rather at setting a definite problem, the solution of which is to come only from factual inquiry.

Such bodies of logically consistent doctrines as those formulated by the experts of the American Law Institute are obviously not to be considered as efforts to understand the legal institution as it is. When one considers these "restatements" of the common law and how they are being formulated, one remembers how the expert theologians got together in the Council of Nicaea and decided by a vote the nature of the Trinity. There is a difference between the two occasions. The church fathers had far more power than does the Law Institute to enforce belief in their conclusion.

### *The Is and the Ought*

It has not escaped the jurists that modern legal knowledge is patterned after mediaeval theology rather than after natural science. Instead of attempting to argue away the preeminence in law of authority and coherence and the merely secondary status of fact, they claim that jurisprudence and natural science have very different aims. In answer to those realists who would turn jurisprudence into a natural science, Dean Pound has commented as follows:

" . . . But it should be borne in mind that jurisprudence must consider not merely how judges do decide but how they ought to decide to give effect to the purposes of the legal order, not only how the legal order actually takes place but how it should go forward. Psychology may be of aid in clarifying the manner in which justice is administered but this cannot dispense with the

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40. We intend no prophecy that a restatement of the common law "will not work." If courts gradually accept its propositions as equivalent to a precedent, of course it will work. But we could hardly conclude on such grounds that these propositions had been validated as general principles of legal behavior—as principles of a science of jurisprudence.

question of how justice ought to be administered. This question of ought turning ultimately on the theory of values is the most difficult one in jurisprudence. Those who long for an exact science analogous to mathematics, physics or astronomy are inclined to seek exactness by excluding this problem from jurisprudence altogether. But such a jurisprudence has only an illusion of reality; the significant question is the one excluded."<sup>41</sup>

We may set aside the point that the scientific view of law promises an accuracy it cannot achieve. Science promises only such accuracy as it actually achieves. What science does promise is uncompromising honesty. But Dean Pound's contention that emphasis upon the *is* tends toward the neglect of the *ought* deserves more serious attention. Certainly the detailed scientific examination of any group of natural phenomena is characteristically disturbing to conventional judgments about those phenomena. Certainly, too, the scientific exploration of an area in which conventional judgments have previously dominated cannot successfully be made without holding those moral judgments at least temporarily in check. But we are left with the question whether the result of scientific inquiry in a traditionally moral realm is to eliminate moral judgments there or to render them permanently uncertain, lukewarm, and ineffective. Is Science a jealous mistress who will tolerate no trifling with Morality upon the part of her admirers? Or is the opposition merely relative and temporary?

Not so many years ago the *moral* judgment was confidently made that persons suffering from manic excitement *ought* to be violently subdued. The presence of such a person in a community naturally aroused a good deal of ignorant fear which was relieved just in proportion to the physical violence with which the psychotic was handled. In the course of time men of calmer temper had the courage to set aside the customary moral estimate of the mentally deranged and to survey the facts. Gradually these facts made an impression upon the public and gradually the public came to appreciate the essential folly of its former valuation. From our present vantage point it seems as though the encroachment of the naturalistic attitude in this case brought nothing but moral gain. We may nevertheless imagine something of the trepidation with which conservatives saw the old values tottering and giving way. They must have felt that society was losing its firm grip upon a vital situation—that hard-headedness was giving way to sentimentality.

Present-day criminology and penology furnish a similar picture, though in this case we are in the stage of moral unsettlement rather than in that of a new moral valuation. The public would rather do vicious and often useless things to criminals than admit that its judgments about

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41. Pound, *Jurisprudence* (1932) 8 ENCYC. SOC. SCIENCES 477, at 485.

the criminal problem are incorrect; yet men of science continue to accumulate evidence that deterrence and cure have no simple and direct relationship to the severity of punishment and there are already many signs that the old values are losing certainty.

A primary source of these anxieties about the moral life, which are so frequently associated with any intellectual advance, lies in a superficial understanding of the nature of moral judgments. There is a failure to see that moral judgments are themselves conclusions regarding the facts and that, wherever there are widely accepted facts, the moral values will be brought into line with them. To assume that natural science typically takes a purely passive view of nature is to forget that scientists have typically been men seeking the good life. As Maurice Hindus has so brilliantly shown, the Bolsheviks, though they have attempted to discard all social beliefs that do not meet the tests of scientific validity, are yet more conscious of moral values than is the average member of a conventional western community. Their values, are, of course, very different, but they are no less commanding.<sup>42</sup>

The period of moral uncertainty is not the product of an over-emphasis upon truth and a neglect of right; it is simply a symptom of a period during which fact-knowledge is being revised. Nor is moral uncertainty to be satisfactorily cured by isolating it from that attitude of objectivity in which matters of truth are most reliably estimated. Its cure lies only in pushing forward until new and more reliable knowledge of fact can fully replace older presumptions and superstitions. There is no way of stepping beyond the reach of the critical phases of naturalistic understanding and waiting until old moral certainties can be replaced by new ones. The painful transitions must be borne.<sup>43</sup>

Moral judgments are judgments of what ought to be done about something, but how can they be dissociated from the nature of the something! We are as sure today of the desirability of humane treatment of the insane as men were two hundred years ago of the need for the torture of revolving chairs and straight jackets. But this change is not to be looked upon as a merely parallel development in the facts on the one hand and in moral values on the other. At every step the scientific and the moral have been interwoven. If there was a period during which men were doubtful as to whether they *ought* to treat the insane as sick or as possessed, that was a period when there was some doubt about the facts.

If the shrinking from a naturalistic study of legal institutions is based

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42. HINDUS, *HUMANITY UPROOTED* (1929).

43. This transition period is hard on pedagogues, because it reduces their faith in the old subject-matter faster than it produces new supplies. Teachers often remain conservative simply in order to give ample content to their courses.

upon the fear that there will be a period during which verifiable positive knowledge will hardly equal in detail the traditions that the new attitude will overthrow, then that shrinking has good historical basis. But there is no other way of attaining an improved set of values as to what courts ought to do than that of going through a period during which we thoroughly discredit many of the things courts have been thought to do. There will be a period, too, during which the positive facts uncovered will be scattered and poorly understood—a period during which we shall have less confidence in our judgments of the *oughts* of law than men used to have.

Yet there is reason to believe that the period of less certain opinion as to facts and therefore of less certain moral judgments will be no more hazardous a transition than many another that men have undergone. Wise Christians once thought that all moral judgments rest upon a literal interpretation of the scriptures. But the refutation of that doctrine was negotiated with relatively little social upheaval. Men went on making moral judgments even when they were personally troubled as to the consequences of the higher criticism.

There is even the possibility that the public's present attitudes toward the law have little of that confidence which legal scholars are afraid to see disturbed. There is evidence that the common man already discounts to a large degree the authority and certainty of the courts. Thus, a pushing forward with critical and naturalistic studies of legal behavior is not likely to be upsetting to him. He is already in the stage of moral uncertainty because he does not know what to think about the law. It has required no unmoral science but only common observation to show him that there is a great discrepancy between what courts do and what they talk about.<sup>44</sup> But it will require a determined intellectual effort to supply him with a fresh and objective description of legal institutions in order that he may have the materials upon which to base a set of confident moral judgments about the law. Give him facts that are clearly valid, and we need have no fear lest he gradually come into a completely neutral state regarding legal issues. He may decide that trial courts as we have known them *ought* to be abolished, that the analogical argumentation from the cases *ought* to be severely restricted and revised, that the law *ought* not to go on pretending that, whereas a psychotic criminal is a member of the natural universe, a sane criminal exists on an entirely ethical plane. And if a naturalistic jurisprudence finally gives him the facts upon which confidently to base such judgments, we may be sure

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44. It has been shown by MALINOWSKI, *CRIME AND CUSTOM IN SAVAGE SOCIETY* (1926) that even primitive people are capable of taking a tentative, sophisticated, evasive attitude toward their own laws.

that those judgments will have all of the vitality and force possessed by the morality of old.<sup>45</sup>

### *Leadership or Decay*

Despite anthropologists, psychologists, sociologists, economists, and other academic persons who have made a genuine effort to apply the scientific method to the social world, the social philosophy that is actually expressed in public policy is that of the men of law. But there is no reason to believe that this condition will hold indefinitely. Indeed, we have tried to show that, as the gap between naturalistic (scientific) and social thought becomes more and more obvious, we approach a time when legalistic theories of the social process will inevitably be given up. Even the plain man is already uneasy in the presence of these incompatible ways of thinking and as this feeling increases he will be forced to relegate the juristic concepts that have hitherto dominated his social thinking to that realm of antiquities to which he has already dismissed the Scholastic and Calvinistic theologies.<sup>46</sup>

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45. Compare with this discussion the pointed statement by Llewellyn, *Some Realism about Realism* (1931) 44 HARV. L. REV. 1222, at 1236:

"... whereas value judgments must always be appealed to in order to set objectives for inquiry, yet during the inquiry itself into what is, the observation, the description, and the establishment of relations between the things described are to remain *as largely as possible* uncontaminated by the desires of the observer or by what he wishes might be or thinks ought (ethically) to be. More particularly, this involves during the study of what courts are doing the effort to disregard the question what they ought to do. Such divorce of Is and Ought is, of course, not conceived as permanent. To men who begin with a suspicion that change is needed, a permanent divorce would be impossible. The argument is simply that no judgment of what Ought to be done in the future with respect to any part of law can be intelligently made without knowing objectively, as far as possible, what that part of law is now doing. And realists believe that experience shows the intrusion of Ought-spectacles *during the investigation of the facts* make it very difficult to see what is being done. On the Ought side this means an insistence on informed evaluations instead of armchair speculations. Its full implications on the side of Is-Investigation can be appreciated only when one follows the contributions to objective description in business law and practice made by realists whose social philosophy rejects many of the accepted foundations of the existing economic order."

For a more general discussion of this problem, see Weiss, *Value as an Objective Problem in Psychology* (1932) 27 J. ABNORMAL AND SOC. PSYCH. 111.

46. The contrast between the sociological and the legal attack upon crime is well illustrated by a recent statement by Tenement House Commissioner Langdon W. Post, N. Y. Times, July 30, 1934:

"Behind the Dillingers and the Diamonds, the Gerald Chapmans and the Pretty Boy Floyds there stands the slum. As long as we leave it there we make a very futile gesture indeed when we pass out sawed-off shotguns to our policemen, tighten our laws, hand out longer sentences and generally concern ourselves with the problem at only one end, the suppression of the finished criminal. His suppression is necessary and should be vigorous, but sooner or later we must come face to face with the great question of the forces which

This might be taken to be a prophecy of the decay of the legal profession; and such a result is quite within the bounds of possibility. Practically all recent advances in criminology have been made by psychiatrists and sociologists. Juristic thinkers, when confronted with the problem of crime, seem unable to get an idea on the subject. They fill the air with moral indignation. They talk about the alacrity with which bad men are hanged in England, but they seem unable to say anything of importance on the subject unless they escape from the law and talk psychiatry and sociology. As a group the lawyers view recent governmental developments with alarm. They say that they are afraid of bureaucracy, but it is fairly easy to see that they fear that the solution of commercial, industrial, and agricultural problems will be passed over to men technically trained in these fields who will act with little regard for the concepts and phrases of jurisprudence. They see too plainly that the legal learning in which they have a vested interest is in very real danger of losing its market value.

It is not, of course, inevitable that the legal profession should gradually decay as social pressure requires the services of psychiatrists, economists, and other technical men. There is the possibility that, in the face of this pressure, legal theory itself will change and that lawyers will develop a new conception of the task of social engineering. We have seen that such a transition is not easy for a profession which has so long identified its social prestige with its conventional habits of thought, but rising social demands are in the end very likely to be served. Some of the more progressive schools of law are already turning out graduates whose fundamental attack upon social problems is that of the economist rather than that of the jurist. But there is thus far an insufficient realization that this is only a hint of what the future is likely to require. Even in such schools we still find prevailing the idea that economics, psychiatry, and the rest are merely techniques that up-to-date lawyers must learn to use. This frequently results in much confusion. The man who has secured an economic or psychological grasp upon a legal problem is not quite willing to go clear through along that line of thought. Observers of many of the recent governmental hearings in connection with industrial and agricultural adjustments have reported a tendency even for the more progressive men to retreat, under fire, into the old jungles of legal dialectic, where obviously desirable social objectives become logical impossibilities.

And yet the men of law still have before them the opportunity to be-

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originally start the criminal on his anti-social path. New York's slums have now been demonstrated as a principal one of these forces, and their elimination should go forward with all the zeal an informed citizenry is capable of bringing into play."



come leaders in social thinking instead of guardians of outworn ideas. The method of science has been applied to social problems thus far only by the academician and specialist. There is greatly needed a social engineer who will apply that method over a wide front and in the practical solution of urgent social problems. There is greatly needed a social engineer who, through the application of the best available knowledge, will teach men new and better ways of meeting their problems—of settling their disputes. There is no doubt of the opportunity. There is simply a question as to whether the lawmen will grasp it or whether the opportunity will, itself, create a new type of public servant—a real social engineer.