SOME ASPECTS OF RECENT CONTRIBUTIONS TO LOGIC IN THE SERVICE OF LAW

In 1588 Abraham Fraunce published a book which he entitled *The Lawiers Logike*. It was to exemplify "the praecepts of Logike by the practice of the common Lawe". In the poem dedicating the book to Lord Pembroke, the author says that "I see no reason, why that Law and Logike should not bee the nearest and the dearest freends, and therefore best agree". This book, influential in its epoch, fell into oblivion in the course of time, but nothing can detract from Abraham Fraunce's words of commendation. There have been depracators of the use of logic in the service of law and their views have been influential; however, none of them has succeeded in achieving anything more than entrenching preconceived ideas in impressionable minds to re-echo misunderstandings about logic and its relations to law or in voicing misdirected objections to logic, objections the proper target of which is something other than logic.

If it is assumed that some consistency of its component parts is an indispensable condition of any legal system and that its operation must by and large exhibit conformity of expected or performed conduct to the conduct prescribed by its norms, then there has never been any law without logic. The so-called irrationalities of law are really not lack of logic in law and legal reasoning but rather manifestations of intricacies of the structure of law and reflections of intractabilities or uncertainties of its substance.

It is surprising that after Abraham Fraunce's book there has not been any further book of similar scope in English. Even the recent awakened interest in logic among Anglo-American legal theorists and practitioners has materialised only in a large number of articles written on applications of logic in the lawyer's field of work being often unintelligible to those not initiated in modern logic. The absence of an adequate English introduction to logic in the service of law, let alone a text-book of juristic logic, must not be regarded as a sign that the role of logic in the field of legal reasoning is trivial. What it indicates is that our legal thought has been able to carry on without explicit recourse to principles and methods of logic as a rigorous discipline of thought. We have been able to afford to omit the study of logic in the ordinary curricula of our law schools and to manage tolerably well by employing, both in legal education and in legal practice, a quasi-logic embedded in patterns of ordinary and of juristic languages.

Nevertheless, it cannot be denied that explicit knowledge and skill in application of the principles and methods of logic proper is important for the lawyer and that anything short of this either will not often do at all today or will do only for limited juristic purposes and for lower levels of lawyers' activities. Explicit knowledge of logic brings many benefits to the lawyer. Above all, it helps the reasoner to acquire proficiency and self-confidence in reasoning. For logic charts the practicable roads of reasoning and indicates the pitfalls which await those who diverge from these roads. Those who master the principles and methods of logic are capable of discovering quickly and with assurance defects of reasoning in their own arguments as well as in those of their opponents, to expose these defects and to dispose of or to overcome them efficiently. This gives poise to the reasoner in argumentative situations.

In contrast to the absence of any major work on contemporary juristic logic in English, there are a number of such works in other languages. These works do not only purport to exemplify the precepts of logic by the practice of law, that is, to employ law as a material of logical operations (which was the main endeavour of Fraunce). They approach logic from the position of the lawyer rather than that of the logician, or rather, they seek to find out what services logic can render to legal reasoning and to explore whether certain adjustments, modifications, or extensions of the logicians' logic are required in order to make logic serviceable to law. In the present article we are going to consider some aspects of a recent Spanish contribution and a recent French contribution to juristic logic, both approaching logic from the lawyer's point of view. The books we shall discuss are:

Eduardo García Máynez, *Lógica del raciocinio jurídico* (Publicationes de *Diánoia*, México-Buenos Aires, 1964) 180 pages

and

Georges Kalinowski, *Introduction à la logique juridique* (R. Pichon & R. Durand-Auzias, Paris, 1965) 188 pages.

The book by Professor Eduardo García Máynez, Director of *Centro de Estudios Filosóficos* of *Universidad Nacional Autónoma de México*, represents the third volume of a comprehensive treatise on juristic logic, whose first two volumes are *Lógica de juício jurídico* (1955) and *Lógica de concepto jurídico* (1959). In the book here under review, the author is concerned with the process by which general legal norms are applied to concrete legal experience (ch. I), with the principle of contradiction in its application to juristic logic and the problem of antinomies (ch. II), with the theory of "juristic syllogism" (ch. III), and with the reasoning by analogy and *argumentum e contrario* (ch. IV). In each part of his present book García Máynez has assumed positions and expressed thoughts which require extensive comment and discussion. And this not only because of the wealth of insights which the book contains but also because of some controversial issues which emerge from his expositions. Within the confines of the present article the reviewer can in the main only afford to address himself to certain problems which arise from the author's treatment of the antinomies in law.

According to García Máynez, legal norms are not to be conceived of as utterances (*enunciados*) which have epistemic values (*valores veritativos*) "truth" and "falsity", as ordinary propositions have, but they have deontic values (*valores deónticos*) "validity" and "invalidity' (p. 8). Hence the principle of non-contradiction as formulated in the Aristotelian "apophantic" logic and in systems of logic which have followed the idea of Aristotle's *apophansis* does not provide a sufficient basis for dealing with the antinomies in law, even though these involve contradiction or inconsistency in a certain sense.

The author contends that for "a *genuine antinomy* (*antinomia auténtica*) it is necessary that there be an *absolute inconsistency* . . . between a norm which prohibits and a norm which permits" a certain conduct "and which, as a result, makes their *simultaneous application impossible*" (p. 97). It is to be understood, of course, that both norms are of equal rank order and relate to the same legal subjects in the same conditions of space and time, and to the same conduct (*ibid.*). The author proceeds to say that "what characterises all cases of contradictory opposition between legal norms is . . . the fact that the inconsistency of its dispositions excludes a third solution: the conduct which law regulates cannot be, at the same time, . . . *neither permitted nor prohibited*" (p. 100).

The reviewer agrees with the author that the values "truth" and "falsity"

are not proper for legal norms but would voice a doubt as to whether "validity" and "invalidity" are satisfactory alternatives as *logical* values of norms. Perhaps "observable" and "non-observable" would be more appropriate. A more extensive comment is required regarding the author's statement that "the conduct which law regulates cannot be, at the same time, neither permitted nor prohibited".

It is, of course, undeniable that if law regulates a conduct it *either* permits it *or* prohibits it. However, this does not mean that every legally relevant conduct (as distinguished from legally regulated conduct) must either be permitted or prohibited by law. There can be absence of law, gaps of law, or legal neutrality in relation to a legal system; in particular there are situations in which the law itself refers to a non-existent legal provision (for example, a treaty between two states refers to a local custom which proves to be non-existent). Unless we assume the so-called residual negative legal principle according to which whatever is legally not prohibited is legally permitted as an indispensable part of all legal orders, the absence of law in relation to legal orders (a legally relevant conduct which is neither permitted nor prohibited) is a possibility of which juristic logic must take notice. Every legal system can make, of course, its own arrangements for "unprovided cases", and one of them is incorporation of the above mentioned residual negative legal principle. It may be argued that the international legal system does not contain this principle, and in that sense it is "normatively open". There are no logical reasons, and not even mandatory considerations of justice or expediency, which determine that all legal systems must be normatively closed.

The principle of non-contradiction of juristic logic is formulated by García Máynez as follows: "Two legal norms which contradict each other cannot be both valid" (p. 102). This principle is subject to challenge if it is understood (as in fact it is ordinarily understood) that "validity of a norm" means that a norm belongs to a legal system. It is conceivable that as a result of oversight or certain fiendish intentions of the political authority which has enacted laws there are the following antinomic norms in a legal system: "X ought to do Y and if he does not do Y he ought to be punished" and "X ought not to do Y and if he does do Y he ought to be punished". Let us suppose that there is no legal ground in the legal system in question either to consider both norms invalid or to consider one of them valid and the other invalid. This is, to be sure, an awful situation for X, but quite conceivable. It may amount to the same thing as saying that X belongs to a class of people which the corresponding political authority wants to harass (even destroy) under all circumstances. Hence all we can say is that antinomic legal norms import a moral or political defect of the legal systems in which they occur. From the logical point of view, the normative contradiction together with its unfortunate implications stands, unless there are special provisions to remedy the situation. Logic can only assist in drawing attention to the situation by revealing it and by guiding the legislator and those who apply the law to work out appropriate remedies.

García Máynez draws attention to the important distinction between contradiction *between* norms (giving rise to antinomies) and contradiction *within* norms themselves. The latter we may call "normative self-contradiction". It can be expressed in the form: "X ought to do both Y and non-Y". The self-contradictory norms are similar to statements such as "This body has no extension" and "This plain is mountainous" (pp. 107 *et seq.*). In the realm of physical reality such statements involve counter-intuitive concepts ("a sizeless body", "a mountainous plain", "wooden iron", "timeless event", "whispering silence", etc.), which can be regarded as meaningless together with the utterances which they incorporate. Meaninglessness of this kind can

have poetical merits, but it offers us no guidance in our orientation in the real world. We can treat self-contradictory norms, too, as meaningless, and as such no guidelines for conduct at all. However, from a strictly logical point of view "both Y and non-Y' can be treated as referring to a class whose membership contains everything whatsoever in the universe. Accordingly, a legal norm in the form as stated above ceases to be absolutely meaningless. It has a meaning, to wit, that X ought to do everything in the universe; which is, of course, absurd. It still can stand as a valid norm, and it is conceivable that the political authority which has issued it has certain evil intentions to ask certain people to do what is impossible in order to impose sanctions on the non-performance of conflicting obligations which these people are absolutely incapable of performing.

In contrast to the above discussed book by Professor Eduardo Garcia Máynez, which brings to a conclusion a major treatise on juristic logic, Dr. Georges Kalinowski, *Chargé de Recherches* at the *Centre National de la Researche Scientifique* of Belgium, purports by his book to offer only an introduction to logic in the service of law. His book covers, in a concise manner, fundamental notions of logic (ch. I), juristic semiotics (ch. II), the logic of norms (ch. III), normative and non-normative juristic reasoning (ch. IV), and juristic semiotics and logic in face of legal philosophy and legal science (ch. V). Kalinowski's *Introduction* contains rather extensive discussions of problems which are peripheral to juristic logic. The reviewer is not quite sure whether this is a virtue or a vice; for these discussions tend to divert the reader's attention to matters which can more profitably be dealt with in separate works, but on the other hand they help the reader to appreciate the general jurisprudential orientation of the author and place juristic logic as conceived by the author into a broad context of preliminary or surrounding disciplines of this logic.

The author starts his treatment with a presentation of fundamental principles of logic in general. These include only principles of modern or symbolic logic. The ignoring of traditional logic in recent books on juristic logic has become quite common, being based on the consideration that symbolic logic is a vastly superior tool of formal thinking as compared with traditional logic. It has admittedly not only a greater precision but also a wider scope than the latter, which can be completely expressed in terms of symbolic logic and can be reduced to principles and methods of its calculi. The appreciation of the superiority of modern logic has thus given rise to the view that traditional logic has outlived its usefulness and that in the contemporary world of learning, including juristic learning, it is only of historical interest.

The reviewer is not eager to share this view. He feels that traditional logic has not yet reached the end of its career. It retains vitality as a quintessence and refinement of the logic which is implicit not only in ordinary ways of thinking but also in scholarly ways of thinking. Lawyers are still thinking very much along the lines of traditional logic and are frequently employing its terminology. Moreover, presentation of the system of traditional logic provides perhaps the best access to the understanding of rather esoteric ideas of symbolic logic and for an appreciation of its special virtues. It may therefore be argued that an introduction to juristic logic should familiarise its potential readers, namely lawyers, with basic ideas of traditional logic, too.

Of the particular matters treated by Kalinowski in his present book, the reviewer has selected his treatment of juristic *argumenta a fortiori* and *a simili ad simile* (often, but objectionally, also called "*argumentum per analogiam*") as objects of comment.

As to *argumentum a fortiori* (divided into *argumentum a maiori ad minus* and *argumentum a minori ad maius*), this proceeds from the idea that if

there is a weaker reason to assert something, then given a stronger reason, the same assertion is also tenable. Inference by *argumentum a fortiori* is logically valid if the relevant reasons are *logical* reasons. Thus the so-called hypothetical syllogism can be regarded as an instance of *argumentum a fortiori*: *If* p *then* q *and if* q *then* r; *consequently, if* p *then* r. For example, "If this act is a murder then it is a homicide and if it is a homicide then it is a crime; consequently, if this act is a murder then it is a crime".

The relevant reasons in case of the specific juristic *argumentum a fortiori* are, however, not logical but extra-logical reasons. For example, it is argued that if it is prohibited to take dogs on public transport then it is also prohibited to take (for instance) wolves on public transport. Such an inference is invalid from the formal point of view, because wolves are not dogs although there is a reason to believe that they are a greater potential nuisance than dogs (even if a wolf is domesticated and has proved to be always well-behaved).

As to *argumentum a simili ad simile*, this proceeds from the idea that if certain legal consequences are attached to certain legally relevant facts, one is entitled to attach the same legal consequences to essentially similar legally relevant facts. This argument can be represented in the following form:

If the facts f_1, f_2, f_3 are given, then the legal consequence c ought to follow.
The facts f_4, f_5, f_6 are given and they are essentially similar to the facts f_1, f_2, f_3.

The legal consequence c ought to follow.

This inference is invalid under the rule of *modus ponens* of hypothetical inference.

Nevertheless, *argumentum a fortiori* as well as *argumentum a simili ad simile* play an important role in juristic reasoning and they lead to results which are found *sound* by lawyers. One way of explaining this is that they are not formal (or stringent) arguments but informal (or non-stringent or "rhetorical" arguments), which have an important place in all reasoning, including juristic reasoning. If this explanation is accepted as the only basis of their rationale, the proper place to deal with these arguments is not a book on juristic logic but rather a book on juristic theory of argumentation.

Kalinowski offers an explanation of *logical validity* of juristic arguments *a fortiori* and *a simili ad simile* (pp. 162-167), which is acceptable to the reviewer and which can be stated as follows: If instances of these arguments are found legally tenable as being logically compelling, they represent logically valid abridged inferences (enthymemes) in which certain premisses are suppressed (unstated) but taken as understood by those who administer the law. In case of *argumentum a fortiori* the suppressed premiss can be conceived in the form: "If X ought not to do Y which is of lesser significance than Z, then likewise X ought not to do Z" (*argumentum a minori ad maius*) or "If X may do Y which is of greater significance than Z, then likewise X may do Z" (*argumentum a maiori ad minus*). In case of *argumentum a simili ad simile* the suppressed premiss can be conceived as being to the following effect: "If the facts of an unprovided case are recognised by competent authorities as essentially similar to those of a provided case, then these authorities may attach the same legal consequences to the unprovided case as they may attach to the provided case". What the suppressed premisses in each particular case are depends on the accepted interpretations of relevant norms in the given legal community or by *rationes decidendi* emerging in judicial practice.

A similar position is taken by Professor García Máynez in the book we have already discussed in this article. He says that the juristic *argumentum a simili ad simile* differs radically from the argument of the same name studied by classical logic. "The question is not, indeed, of an inference from particular

to particular . . . but of a search for a formulation of a *more general* principle . . . implicit in what is expressly regulated and which is applicable to unprovided cases" (García Máynez, *op. cit.* 159).

In conclusion, the reviewer would like to say that both books here discussed are important contributions to juristic logic not only in the areas of legal civilisation for which they have been written but also outside of them. The whole field of juristic logic is still in the stage of settlement, and therefore it is natural that scholars who have addressed themselves to its problems disagree with each other on several points. But through controversies which arise when they study each other's works they learn from each other and thus can be expected to arrive at insights which will be incorporated in a future logic in the service of law liable to have universal assent of experts in this field, and which will prove to be a useful *organon* for all lawyers: legal theorists as well as legal practitioners.

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