

William Kingston

Innovation, Creativity and Law

Studies in Industrial Organization



K L U W E R A C A D E M I C P U B L I S H E R S

Innovation, Creativity and Law

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D19)37
K55

by

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Kluwer Academic Publishers

Dordrecht / Boston / London

Library of Congress Cataloging-in-Publication Data

Kingston, William.

Innovation, creativity, and law / William Kingston.

p. cm. -- (Studies in industrial organization ; v. 10)

ISBN 0-7923-0348-2

1. Patent laws and legislation. 2. Technological innovations--Law and legislation. I. Title. II. Series.

K1505.4.K555 1989

346.04'86--dc20

[342.6486]

89-36258

ISBN 0-7923-0348-2

Published by Kluwer Academic Publishers,
P.O. Box 17, 3300 AA Dordrecht, The Netherlands.

Kluwer Academic Publishers incorporates the publishing programmes of
D. Reidel, Martinus Nijhoff, Dr W. Junk and MTP Press.

Sold and distributed in the U.S.A. and Canada
by Kluwer Academic Publishers,
101 Philip Drive, Norwell, MA 02061, U.S.A.

In all other countries, sold and distributed
by Kluwer Academic Publishers Group,
P.O. Box 322, 3300 AH Dordrecht, The Netherlands.

printed on acid free paper

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Printed in the Netherlands

INNOVATION, CREATIVITY AND LAW

Studies in Industrial Organization

Volume 10

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Invention and Monopoly

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The Political Economy of Innovation

Direct Protection of Innovation (*Editor*)

PREFACE

This book develops the theme of my earlier *Innovation: The Creative Impulse in Human Progress*, and considerably expands the latter book. I came to the study of innovation from experience in industry which had brought me into close practical contact with it, and my initial interest in the subject was in terms of the way in which it expressed human creativity.

Progressively, however, my focus shifted towards the laws which help or hinder creativeness in being economically fruitful. This led to the writing of *The Political Economy of Innovation* and the editing of *Direct Protection of Innovation*. In the latter work, I had the opportunity of arguing the case for specific new law to complement the Patent system, and of having that case criticised by experts.

Just as the first book set economic innovation in a wider context of creativity, the present one sets the law that makes it possible in a wider context of property rights. This is because my study of *intellectual* property resulted in growing awareness of the incomparable past value and even greater future potential of these rights for innovation and prosperity. My intellectual debt to Douglass North is as great in this later stage as it was to Joseph Schumpeter in the earlier one, and to Christopher Dawson, by whom I had the good fortune to be taught in person, in both.

It now seems to me that no type of innovation – or, more specifically, no type of interaction between creativity, innovation and law – is more important than that of creative law-making. This in turn involves obtaining answers – inevitably poor and partial ones – to the question, “how can we get *efficient* property rights?” The present book will contribute something, I hope, towards understanding of just how important this question is.

Interest in innovation is growing in both Europe and America, stimulated by real fear that the power to innovate which the Japanese have demonstrated, will prove to be unmatched. There is widespread awareness that their powerful onward thrust towards worldwide domination of many industrial sectors is due to better understanding of the innovatory process – “getting new things *done*”, as distinct from “finding new things” – since Europeans and Americans know they still lead in discoveries. In addition, in Western countries, there is now a palpable degree of uneasiness about the meaning and value of much contemporary innovation. This is reflected in the various movements that can be grouped as “Green”, and it can even amount to outright rejection of the social structures which are associated with the existence of innovation in such plenty.

It is possible both to understand these different attitudes and to reconcile them, from the viewpoint that innovation is simply one of many ways in which human creative energy can be expressed. However, it has been characteristic of recent stages in the culture of the West that this particular type of energy has tended to run into technological and technical innovation, rather than into survival or liturgy or art or literature. These are

all areas of life in which very much the same kind of energy has spent itself, just as unequally, in different places and at different times in the past.

Consequently, although it is in technological innovation that much of one particular kind of excitement is to be found today, innovation is a great deal more than this, and in fact, a better understanding of it even in relation to technology is obtained by studying it in a wider meaning. The result of such a shift in the perspective from which it is usually examined, is to emphasise the diversity of factors in economic innovation. Only to the extent that these factors are understood, will it be possible to devise a legal environment for innovation that is both Western and capable of meeting the challenge of the Japanese.

The first three Chapters, "Between the Dreamer and the Mandarin", "Innovation as Learning" and "Innovation and Money", come from the earlier book. Chapters IV to VII, "Property Rights and Innovation", "Intellectual Property and Information Theory", "Financing Information and Ideas" and "Some Innovatory Initiatives" are new material. They place innovation in a property rights context, and, in particular, use Information Theory to throw new light on intellectual property. In the final Chapter, "Creativity in Innovation and Law", earlier ideas about creativity in business are supplemented by a discussion of the problems of achieving efficient property rights. The lesson from this is clear: For institutional arrangements that will be economically fruitful, we must look to factors that transcend economics.

WILLIAM KINGSTON

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CHAPTER I

BETWEEN THE DREAMER AND THE MANDARIN

Artist, inventor, innovator, entrepreneur, trader – all words which describe people doing things. One senses something in common between them, the meanings of any adjacent pair of words in the group shade off into each other, and yet there is an evident contrast between the extremes. People doing what artists do are obviously not doing what traders do, yet it is perfectly possible to think of individuals to whom several of the descriptions in the list could have been applied during their lifetime. Serge Diagilhev, who made the Russian ballet famous throughout the world, was undoubtedly artist, innovator and entrepreneur all at once. Leonardo da Vinci was outstanding in the first three roles; Edison was everything but an artist at different times. The meanings of these words are worth dwelling on, since it is one of them – “innovator” – that is to be examined at length.

Considering the extremes first, it is easy to see the activity of both artist and trader as having in common a combination of “seeing” and “doing”. We speak of an artist’s “vision”, but an artist does not stop at seeing, he endeavours to express his vision in some communicable form. A trader may not have vision in the same degree, but neither does he act blindly. He starts off with some idea of what he can achieve through action. The difference between the two activities comes from the balance between idea and action. What matters most in the work of art is the vision, that is, what happens *inside* the artist; the greatest art involves technical mastery, but there is no worthwhile art which consists of technique alone.

What matters most in trading is what happens *outside* the trader. There is nothing especially world-shaking about the idea that “sandal-wood, cedar-wood or sweet white wine” may be more valuable in a place where they are scarce than where they are plentiful; what makes a trader is that he actually *does* something about it, and makes the vision, limited though it may be, a complete reality. Another way of marking the contrast is to call attention to the way in which a trader’s activity is socially conditioned, whereas that of the artist resists being modified by the surrounding social culture, if indeed it does not actually seek to modify it.

EXPRESSING VISION

Both artists and traders, then, have “vision” and express it in some concrete way. In one case, the ideas or feelings dominate, and the change in the tangible world is comparatively unimportant; in the other, the change in the concrete, tangible world is more important than the idea. This may be expressed visually as follows:

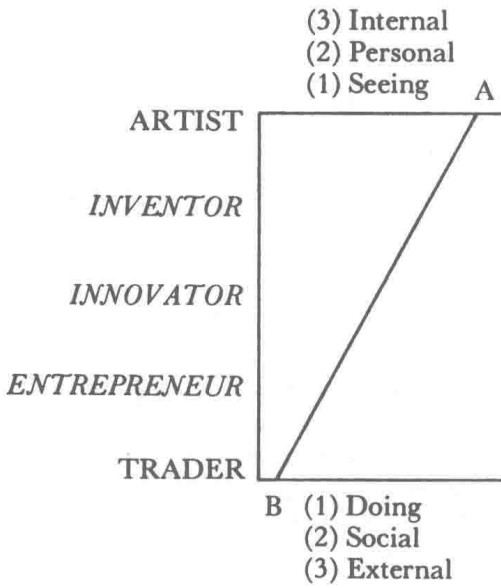


Fig. 1.1.

In this rectangle, those who carry on the activities are listed at the side, and the contrasted pairs of attributes at the top and bottom. A slanted line AB can then be drawn to show the relative proportions of each attribute in each activity. Thus, artistic activity is more “seeing” than “doing”, more “internal” than “external”, more “personal” than “social”. Trading’s proportions are the opposite in each case.

The other three activities of inventor, innovator and entrepreneur, can also be fitted into this diagram. We speak, for example, in praise of an artist’s or composer’s “fertility in invention”, referring to his skill at discovering new and pleasing combinations of paint or sound. But in the even more common sense of the word, an inventor is one who discovers something new and useful or practical, something that *works*. There is rather more of the element of “doing” in his activity than there is in what an artist does. In a parallel way, we know that the material with which an entrepreneur works is generally much the same as that of a trader. In the case of the entrepreneur, however, something is added – he stands out from the crowd of traders, takes higher risks for higher rewards, follows his own line, and in some way puts his personal stamp upon some aspect of economic life. To this extent, what he does is less socially conditioned than what the trader does. It depends more upon what happens in his own mind and heart.

THE INNOVATOR

And what of the innovator? We commonly speak of innovation in the arts or in literature, as well as in technology. If we reflect upon the way in which the word is used, we find that it generally has the connotation, not so much of *originating* ideas, but of taking up an idea and developing it, realizing its potential, or turning it into concrete reality. For these reasons, the position of innovator on the scale is above that of entrepreneur, but below

that of inventor. An innovator may take the ideas with which he works from an inventor – as Matthew Boulton took up Watt's improvement to the steam engine – but there is nevertheless a stronger element of “seeing” in his activity than there is in an entrepreneur's.

Thus, not alone can the five activities be ranked at the side of the rectangle, but many other pairs of contrasting words can be listed, and the same slanted line (AB) will still roughly designate the relative proportions of each pair in any of the activities. In the following diagram, the first of each pair belongs to the top of the rectangle, the second to the bottom of it, as indicated by the arrows:

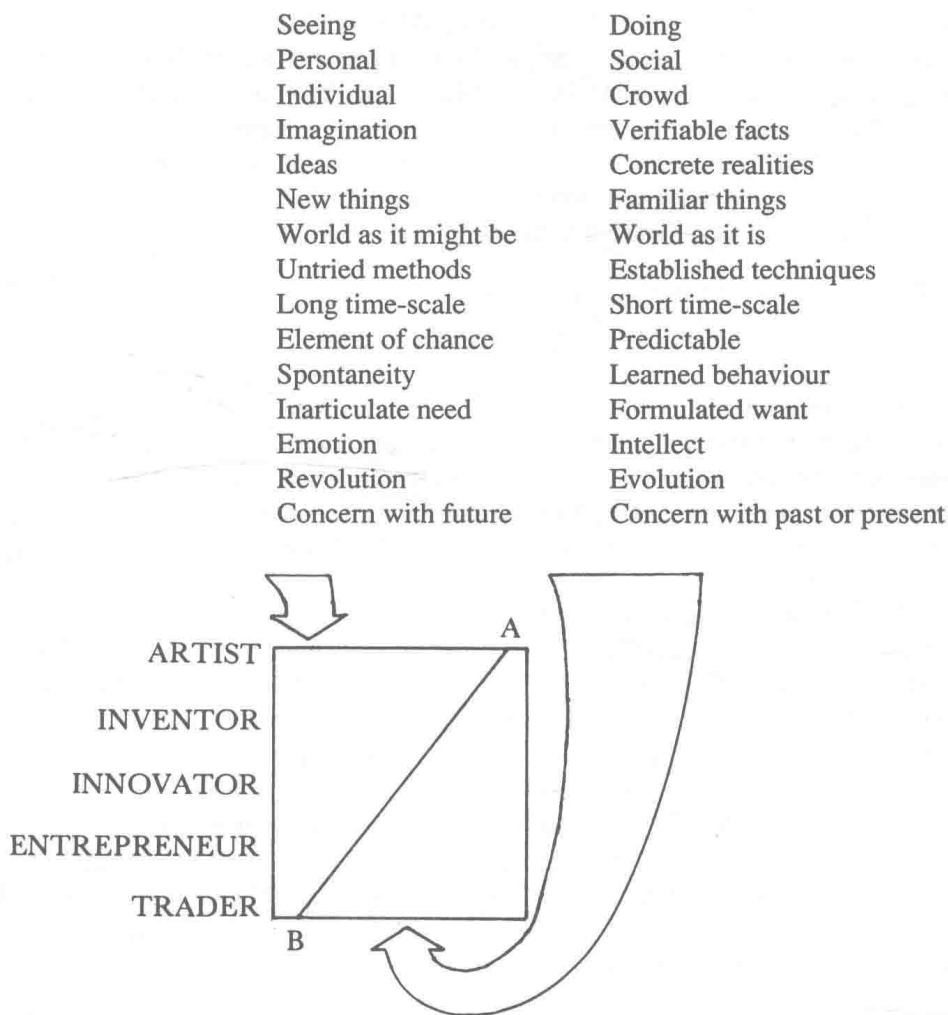


Fig. 1.2.

If we consider the types of person listed, the lower they are on the diagram, the more their activity deals with concrete realities on a basis of verifiable facts, by established techniques, on a short time-scale with everything largely predictable. The higher they are on it, the more their activity is concerned with ideas and imagination, with the world as it

might be rather than as it is, and uncertainty plays a large part; it is more subject to chance, and more time is needed before the full implications of the activity become clear.

To illustrate this, select the opposed concepts of "established techniques" – "untried methods". Obviously, at the bottom of the rectangle, a trader operates as far as he possibly can along lines which he knows well, but an entrepreneur is such precisely because he breaks away from the familiar. In the case of the innovator, the break is a radical one. His idea may not be new, *per se*; what is new is the concrete realisation of it which he is seeking to bring about.

When we come to the inventor, even the idea is new. However, to the extent that it has a bearing on practical life, it will be made up of elements that are previously known. It is at the level of artistic activity that the "untried" aspect is most obvious, but even here the connection with "established techniques" is by no means broken. Only through the use of some form of language shared with his public – which is such a technique – can an artist attempt to communicate his personal vision. Much the same can be said of the pair of words "evolution/revolution". At the level of art, change comes about simply through a single individual, quickly and sharply; at the level of trading, change is invariably slow, by careful steps, generally taken at much the same time by several people.

LOW-GRADE ART

In this, as in all the pairs of words listed, reflection will confirm that the activity of the innovator is characterized by roughly equal proportions of the contrasted attributes. The importance of this is to establish how far innovation needs the vocabulary of Art for its proper description. We cannot hope to understand innovation – even economic innovation – without stepping outside the categories and definitions that apply to trading or even to entrepreneurship.

It may have been noted that the line AB is not a diagonal of the rectangle. This is because all the activities named contain *some* proportion of each pair of attributes listed at the top and bottom. Artistic activity is never without some element of "doing", however much "seeing" may predominate; trading, however much it may be socially conditioned, is never altogether without some personal contribution on the part of the trader, some "idea" in his mind. However, the list can be extended at each end, so as to include peripheral activities, in each of which the proportion of one of each pair of characteristics has become so small that it can be ignored. On the principle that something is only fully understood when its implications have been driven to their absolute limit, it is worth while adding to the list at either end, even though the respective activities may be of little practical concern.

Beyond art, for example, all the elements listed at the top of the rectangle can be found in a way which to all intents and purposes exclude the characteristics listed at the bottom. "Mystic" is possibly the best description of a person who acts in this way, but its use with precision would involve too much explanation in the present context. In its place, "dreamer" will serve well enough, and it is obvious that what distinguishes such a person's "vision" from that of an artist is that in his case the vision is *altogether* private and incommunicable. In the artist's case, it can be communicated to others, at least in part. To the extent that it is communicable, there is a "social" aspect to the artist's

activity. All art does include an element of dream, but it is always more than dream. Even at its most imaginative and personal, the work of an artist is never altogether unconcerned with doing, that is, with externalizing his inner vision in a way which allows it to be communicated to others. Nor can it be altogether apart from the world as it is, nor from established techniques.

It is the same with other elements. Imagination which has no anchor in reality turns into hallucination, insistence upon change through revolution implies equal rejection of the changes than can come through evolution, and so on. In the psychiatrist's shorthand, the neurotic is a person who is partially out of touch with reality, the psychotic is one who is wholly so. It is only when the dream becomes all, that the line AB on the diagram, which defines the relative shares of "vision" and "reality", will finally reach the maximum for one and zero for the other. Short of this point, reality keeps breaking in to a greater or lesser degree.

THE LIMITING CASES

"Dreamer", may not be the ideal word for one limiting case, but "Mandarin" is for the other. The reality whose shape is being groped for in using it, cannot be unfamiliar. The Mandarin class was the bureaucracy of old China, noted for its reverence for traditional norms of behaviour and for a meticulous concern to maintain conformity with these norms in every aspect of life:

This extreme conservative outlook was shared by the whole official hierarchy ... The type of mind that entered the Civil Service was a mind closed to all idea of progress, almost incapable of grasping the possibility, still less the need for change ... The system was self-perpetuating, seemingly immutable".¹

In any field, there will always be people whose activity hardly goes beyond repeating patterns which may once have been highly significant, but which are now no longer so. Preoccupation with ritual, with performing set routines imposed by convention or precedent, unquestioning acceptance of the world as it is, obsession with things made familiar by long association, reluctance to depart from the concrete and the predictable; all these add up to a well-known type of human activity.

What the Mandarin does is as exclusively social as what the dreamer does is exclusively private. One is the extreme example of the man who takes the world as he finds it; the other lives in an imaginative world of his own making. Only in the case of mandarin-like behaviour, then, does the line AB in the diagram reach the point where "doing" is all and "seeing" nothing. As long as it is successful, trading never gets to the stage where it can be said to be utterly lacking in imagination, ideas, subjection to chance, or concern with the future rather than the present. As trading approaches the point where it does increasingly lack these attributes, it becomes correspondingly unsuccessful. Most people have at one time or another encountered businesses or shops where such "hardening of the arteries" is perfectly evident, where the management has become completely mandarin-like, loyally following through routines which were once successful but which have little relevance to contemporary situations, so that they are serving an ageing and declining group of customers. In this case, the trading has moved

into the lower extension of the rectangle in the diagram, in which the line AB has become a diagonal, and the end of the business *has* come into sight.

EXTENDED RECTANGLE

The rectangle may therefore be drawn again to include these additional activities. The area to which these refer is shown in hatched lines to stress that they are peripheral, and we may also plot the relationship of each activity to change in the "external" world:

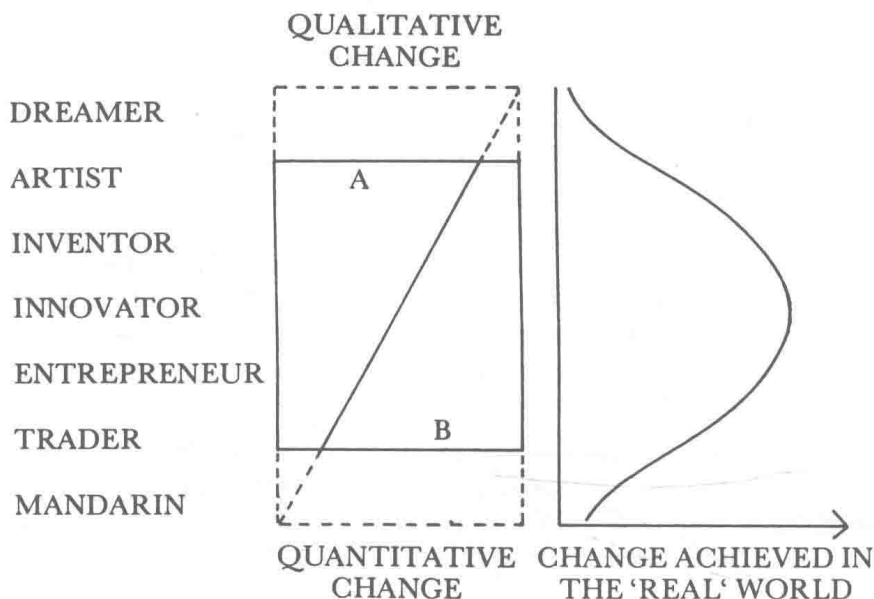


Fig. 1.3.

The limiting cases in this spectrum have been called the Dreamer and the Mandarin, for want of better words to describe the activities in question. Some may be reminded of Arthur Koestler's Yogi and Commissar, but the continuum that is being discussed in the present case is quite different. Koestler's extremes both describe contrasted ways of bringing about change, the Yogi representing *change from within*, the Commissar *change from without*. In the present spectrum, the extremes represent, not fundamentally different approaches to the bringing about of change, but the very *absence of change* in the real world. The dreamer can bring about no change in this because his activity is not at grips with tangible reality. The Mandarin brings about no change in it either, because for him, there is no tension between his thought and the immediately tangible.

RE-ARRANGING THE WORLD

One pair of contrasted attributes on the rectangle which is worth special attention when considering innovation, is "world as it is / world as it might be". Vision – as long as it

remains within the main rectangle – is always seeing a possible re-arrangement of the world as known. It is because artistic activity is always so rooted, and always contains some element of rendering what is seen, tangible or communicable, that

As imagination bodies forth
The forms of things unknown, the poet's pen
Turns them to shapes, and gives to airy nothing
A local habitation and a name.²

Artistic activity begins with the artist's own vision of the world, and it can go beyond mere perception of a possible re-arrangement of the world as it was previously known to him. In the outstanding cases of success in expressing this vision in some way which makes it accessible to others, the result is an imaginative world of such power that it can rival – or even surpass for a time – the world of day-to-day experience. The difference between the artist and the inventor, then, is that the inventor's creativity never leads towards such *rival* worlds. His ideas are firmly related to the existing world, and are limited to that world as it might be in the future. The artist sees and makes a different world, but the inventor is one who sees the possibility of some new relationship between aspects of the *existing* world, and the innovator makes this new relationship a reality.

Sometimes to the activity of artist or inventor there is added that of entrepreneur or trader. Shakespeare was a supreme artist, but he also traded and invested very shrewdly. Bernard Shaw showed remarkable "trading" ability when it came to making money from his writing. In the other direction, the way in which the art dealer Durand-Ruel fought the cause of the Impressionist painters against a solid phalanx of critical scorn goes far beyond mere entrepreneurship. His lonely intensity of perception of their worth will be seen later on to be typical of innovators.

However, in general, entrepreneurship – and trading even more so – is more a question of accepting the world as it is and bringing about a change in only a few aspects, or perhaps even in no more than a single one, than it is of giving some form of tangible reality to a particular vision of a radical re-arrangement of things.

In trading, the element of seeing a possible re-arrangement of the known world may be every bit as small as the element of actively bringing about such a re-arrangement in concrete terms may be in art. For a trader, seeing a possible re-arrangement of the world as known may go no further than adding in the last component which makes a thing have value, measurable in money terms for someone. Frequently this last component is the holding of stocks, or the physical movement of goods from a place where they cannot easily be used to one where they can, thus enhancing their value. For all this to take place, the goods must first exist. No one can hold stocks of other people's *perceptions* of possible re-arrangements for the world as known, nor can he make a business of moving these perceptions, in the abstract, about the world. To the same extent that the artist is concerned with the world of his own imagination, and the inventor is concerned with the world of the future, the trader is concerned with the world of the present.