

THOROGOOD PROFESSIONAL INSIGHTS

A SPECIALLY COMMISSIONED REPORT

THE COMMERCIAL EXPLOITATION OF INTELLECTUAL PROPERTY RIGHTS BY LICENSING

Charles D. DesForges



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A Thorogood Report

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About the author

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Charles was responsible for investing in early-stage innovation at 3i plc, Europe's leading venture capital firm, from April 1984 to March 1993, during which time he was Managing Director of RCL (UK-USA joint venture) and 3i REL; Chief Executive of The Research Corporation Trust; founding-director of Impel Ltd (a 3i plc and ICSTM joint venture); Chairman of Benn Research Ltd. From September 1965 to March 1984, he held senior management/director positions in technology-dependent, US multinational companies (Union Carbide Corporation and Engelhard Corporation) in USA, Belgium, France and UK and spent six years with a UK management consultancy/contract research company (Fulmer Group), having started his career as a sales engineer with Foseco-Minsep plc.

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Preface

This Report has been written in response to a demand for a permanent text arising from the seminars, which I have been presenting, on the commercial exploitation of intellectual property assets by licensing, under the auspices of Thorogood Publishing since 1988. The theme is principally concerned with licensing as a commercial activity, taking place within a defined legal framework, the exact details of which will be determined by the jurisdiction in which the licensing business is to operate. There are a number of publications dealing in depth with the legal issues which arise from licensing and the reader is referred to them and to the published decisions of the courts on a variety of licensing disputes for more complete information. The references at the end of this Report in Annex 1, provide sources for those wishing to study these topics in greater detail. I am particularly indebted to Iain Baillie (a London-based partner in the law firm of Ladas and Parry), who has been a continuing mine of information and an excellent teacher, providing incisive comment on all aspects of licensing and especially on the differences between the European and American approaches to the protection of intellectual property rights and the regulation of licensing.

Dr John Schaefer and his colleagues at Research Corporation in Tucson, Arizona provided many occasions to discuss the economic and financial consequences of licensing, based on their extensive and successful experience in commercialising academic research results over many years in the USA. Their contribution to my education was invaluable. The support of Dr. R. J. S. Green in analysing the value of licensing opportunities has been of great help over many years.

This Report is designed to be a reference for the executive who is concerned with the strategic development of a business using a variety of alliance structures, so as to develop new products, enter new markets or simply to acquire or to gain access to new opportunities. The expert intellectual property lawyer may find the commercial viewpoint of value in better understanding the wishes of their industrial clients. Academic institutions wanting to explore the commercial potential of their research activities will find guidelines enabling them to assess whether the licensing of early stage developments is an appropriate route to the market place for their inventions. Financiers may find that the basic principles outlined in this text will enable them to make better informed decisions when businesses approach them for the funding of licensing operations. The success of companies such as BTG plc, which are solely concerned with licensing intellectual property throughout the world, provides both encouragement and inspiration for those seeking to identify and exploit the commercial potential of intangible assets such as patents, designs, software, trade marks and copyright. My comments may help to guide them on the straight and narrow path to eventual commercial success.

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What is licensing?

INTRODUCTION WHAT CAN BE LICENSED? INTELLECTUAL PROPERTY AND ASSOCIATED RIGHTS TYPES OF INTELLECTUAL PROPERTY FORMS AND PROTECTION OF INTELLECTUAL PROPERTY RIGHTS INTERNATIONAL AND NATIONAL PATENT ISSUES THE LEGAL BASIS FOR LICENSING



Chapter 1: What is licensing?

Introduction

Any formal definition of licensing should distinguish the legal activity, whereby an asset belonging to one party is made available via contract for commercial use by another party, from the acts of outright sale or distribution, assignment or loan of intangible assets. More generally these assets consist of intellectual property rights involving knowledge and information or reputation, representing existing or potential parts of a business. As the word licence implies, the owner of the asset or right, the licensor, grants permission to an independent person or organisation, the licensee, to make or have made, to sell or to have sold and to use products, processes and services, embodying the specific asset or right in question, for commercial gain but without transferring the title of ownership i.e. the owner retains control over the asset. In return for granting this permission the owner is entitled, by way of agreement, to receive a share of the net revenue generated by the licensee from their commercial activities. The owner can recover the asset upon termination of the agreement. The crucial feature of licensing is that without the owner's permission any act by a third party which involves the sale of goods or services based on the asset would be illegal. From this simple principle arises the concept of infringement of the legal owner's rights whereby an unauthorised third party exploits the asset in question for commercial purposes. The identification of such an act can eventually lead to the due process of the law to redress the situation to the ultimate benefit of the owner.

The legal documents that give effect to this act of granting permission are commonly termed licensing agreements, although it is more correct to call them contracts, as they nearly always comprise an offer, its acceptance and a consideration. The commercial implications of this basic act of transferring responsibility for the profitable generation of future revenue to a competent third party form a major part of the contents of this Report.

Some questions of principle and definition have to be answered at this point so that we can be clear as to the scope of these deliberations. How does licensing differ from a straightforward sale or an assignment of the assets? What are the features of a franchising deal, which might distinguish it from licensing? At its most basic level a sale is an exchange of goods, property or services for an agreed sum of money or credit, the transaction taking place between a willing vendor and a purchaser, who then becomes the owner. An assignment is an absolute transfer of ownership in a right by an owner, **the assignor**, to a recipient, **the assignee**, and also involves the owner giving up the right to return of the asset if the agreement is breached. Assignments have to be in writing and the document signed by or on behalf of the assignor in the presence of witnesses. Patent assignments require the signatures of both parties and, where co-ownership is involved, the assignment must be signed by all owners with an interest in the right being assigned for it to be valid. It should be pointed out that any continuing rights in an assignment agreement can only be enforced if the assignee can still be sued, which may prove to be a problem in some circumstances. In contrast a licensing agreement can be terminated and the text of such an agreement will always contain clauses detailing when and how the termination is to be effected and how any arising actions such as recovery of information are to be executed.

Franchising, which finds its origins in the USA, has been defined in an American dictionary as 'the right granted to an individual or group to market a company's goods or services in a particular territory' in exchange for a fee. This description is rather limited in scope as franchises often involve third party use by a **franchisee** of trade marks or service marks as well as specific plans, uniform systems and standards plus prescribed business formats associated with the owner's business. The **franchiser** provides all this information. It is claimed that these features ensure consistency of product and a guarantee of high quality. In essence the franchisee is seeking to benefit from the reputation and skills which have been developed by the franchiser and the consumer public identifies these qualities with the franchisee. Two basic types can be identified. In the first category, that of the business format, both a uniform identity and standard procedures are provided thus giving to the business an appearance which is the same no matter where it is carried out. Fast food establishments, typified by McDonald's, are prime examples of this variety of franchise. The second type, perhaps not so well recognised as such, is that of a manufacturing franchise such as the bottling of carbonated drinks using secret recipes or ingredients and trade marks to identify the product when it is sold or distributed. The Coca-Cola bottling franchise is an excellent illustration of the use of this principle.

What can be licensed?

The essence of most licensing contracts resides in intangible assets known as intellectual property rights, which deal with information, knowledge and reputation. The intellectual property receives legal protection either per se for information such as patents, designs and copyright or by commercial use for reputation rights such as trade marks. The distinguishing feature of these rights is their bringing into existence by creative effort. It should be noted that information can be kept confidential and by that very fact have significant commercial value even though it has not received formal legal protection. In an ideal world it could well be preferable to operate in total secrecy rather than to seek formal protection for an invention with its consequential publication and the inevitable attention of competitors. Although the substance of this Report is concerned with patents, designs and copyrights which possess a significant technological content, it must be recognised that there is extensive licensing, which is of immense value, in the entertainment industry involving film, video, books and music. A further consequence of this activity is the licensing of image associated with a wide range of products and in particular clothing. It has been claimed that one of the most valuable sources of income for the University of California in Los Angeles is based on sales of sweatshirts bearing the letters UCLA! The vendor of such articles will not normally require a licence to sell them, provided that they have been obtained from a person such as a manufacturer who has legally acquired the related intellectual property rights from the owner or has legitimate access to them.

The specific situation of agents, distributors and users dealing with a product in which rights exist has to be assessed on a case-by-case basis in order to decide whether they need a licence for their commercial activity. Typically, for example, an agent is acting on behalf of a company and does not have title to the goods as they are merely a 'go between', an interface facilitating contact between vendor and purchaser, and it is difficult to see why they should need a licence for their services. Distributors having title to the goods are usually only reselling them but if repackaging is carried out and a trade mark is used then a licence for such use may be necessary as part of the overall distribution agreement.

Intellectual property and associated rights

A simple definition of intellectual property must encompass a number of essential features: their intangible nature, their coming into existence as a result of creative intellectual effort producing information and knowledge of practical utility and their creation by commercial activity thus giving rise to an identity associated with reputation and goodwill. It is more useful if we regard them as a system of registered and unregistered legal rights, which protect the products, processes and reputation of their creators. Although there is often a focus on the potential financial returns to owners i.e. personal gain, the economic justification for granting monopoly rights for inventive disclosures is related to the general stimulus to trade and commerce provided by their innovative use. Society at large is the prime beneficiary of such activity with any ensuing personal wealth arising from the monopoly judged to be of secondary interest. The basic conflict arising between open competition and private monopoly inevitably leads to nation states having to use legal systems and lawyers to produce equitable solutions to the many and various problems which occur in commercial and industrial activity exploiting these property rights.

The history of intellectual property rights

The historical origins of this type of property can be traced back to Roman times when it was considered to be unjust for the writings of an author to be published by another person without the owner's consent; a clear and early indication of the principle of copyright being recognised and having potential value. At a later date the Venetian republic granted patent rights for acts, which we would recognise as inventions. This approach was followed in the 16th century, in England, by recognising industrial activity monopolies but without using the term 'patent', which was to be found in the term 'letters patent' to describe open letters sealed by the monarch, (patent having its root in the Latin verb 'patere' - to be or lie open). These gave rights to an individual to practise a trade thus leading to new economic activity being introduced, often from a foreign country. The Statute of Monopolies, introduced in 1623 in England, expressly recognised that patents were an exception to the general disapproval of monopolies insofar as a 'true and first inventor' was given a 14-year monopoly right of exclusion of use by all other parties in respect of 'letters patent' granted for 'new manufactures'. In the New World the authors of the American constitution, long before industrial activity was envisaged and research laboratories built, gave powers to Congress which would ^opromote the progress of science and useful arts by securing to authors and inventors the exclusive right to their respective writings and discoveries'. Their foresight testifies to their wisdom although they did not distinguish between the relative scope of and differences between writings and inventions. The industrial

revolution and subsequent technical changes that occurred in the 20th century have led to significant changes in patent, design and copyright law at both national and international level but there is still no real expectation that a common and uniform protection system applicable to the major economic regions of the world will be introduced in the near future. These recent developments have seen the original term of 'industrial property' replaced by 'intellectual property' and its application to a variety of rights such as trade marks and goodwill, which concern reputation, copyright, designs, patents and confidential material, generally classified as information.

Types of intellectual property

In the United Kingdom registered rights comprise the following elements: patents for inventions, with protection lasting for 20 years from the date on which an application is formally filed at the Patent Office; designs which are characterised by their external appearance and (until a recent development in European legislation, described later) can be regarded as having aesthetic qualities or in legal terms as having features with 'eye appeal': the right is granted for an initial period of five years from the application date and is renewable every five years up to a maximum of 25 years; trade marks for names, logos, shapes and, rather surprisingly, sounds, colours and smells: these marks are associated with a company's products and services and registration effectively ensures an indefinite monopoly lifetime provided that the mark continues in use.

National variations on these basic principles for registered rights exist and they are particularly relevant for US legislation on patents with respect to three major features viz., the period of protection is 17 years from the date of issue of the patent (more commonly understood as the date of grant) rather than from the date of application; the unique reliance on the principle of the personal '**first inventor**' rather than on the official act of being '**first to file**' a patent application leading to the legal concept of interference; a '**period of grace**' which essentially allows for public written disclosure, including a patent filing in another country, or commercial use during a twelve-month period prior to filing an application without destroying the '**novelty**' of the invention. The legal implications of these points for licensing are significant, with respect to protection being sought in the major industrialised nations and they also impact on the total cost of obtaining and enforcing rights in the USA where legal disputes on invention dates and the novelty of a particular patent can be both protracted and expensive. Needless to say the financial rewards for successful legal actions appear to justify the costs.

Copyright and design rights

Unregistered rights include both copyright and design rights for functional objects. Copyright covers a wide range of subject matter: original artistic and literary works, music, images, both graphic and photographic, and, of great significance for the electronic age, computer software. The relevant definitions of qualifying copyright works in the UK are to be found in the 1988 Copyright, Designs and Patents Act. Some authorities believe that patent protection is more appropriate for software and there are clear signs that this problem is likely to lead to much formal legal argument in order to develop this particular area of intellectual property law. Copyright comes into existence as soon as publication occurs and lasts for the lifetime of the author plus 70 years after the end of the year of the author's death. As with patents it is important to determine ownership of copyright works with two pertinent categories to be considered: employer/employee relationships, where the work is created during the course of employment, and author/ commissioning party arrangements where assignment of copyright will be necessary as part of the deal even though the author has been paid for their efforts. In contrast to patents, where there can only be one patentee, independent creation of a copyright work by more than one person is possible.

One essential point to remember is that copyright protects only the expression of an idea not the idea itself and thus provides the crucial right of preventing unauthorised copying of a work. The illegal copying of computer software, often described by the colourful phrase 'piracy' rather than by the more accurate term of theft, was estimated to equate to worldwide lost revenue of \$12 billion in 2000. During the editing of this text a public announcement was made of an out-ofcourt settlement in England for the infringement of copyright residing in detailed road maps. The settlement in favour of the copyright owner was based on a payment of £20 million, comprising a licence fee plus nominal royalties for the 300 million illegal copies that had been made and sold. Both these examples are excellent demonstrations of the economic value of copyright, even for something as apparently anodyne as a map. English law does not require any aesthetic or creative quality in a copyright work but continental European laws take an opposing view: if a copyrighted work is to receive protection then there must be clear evidence of aesthetic merit arising from its creation.

Unregistered design rights can exist in original designs. This is defined in its legal sense in English law as being 'the design of any aspect of the shape or configuration of the whole or part of an article'; this covers both external and internal features of a design, which are tangible either in a design document or in an article made according to the design. This is in contrast to registered designs where the feature must be visible. There is great similarity with copyright as a design right is automatic and does not require any form of registration, only its

expression in tangible form. The maximum lifetime for protection of this right for a qualifying design is 15 years but it is limited to 10 years from the end of the year of first sale for an article sold. This right prevents unauthorised copying of the design (as opposed to unauthorised copying of the design document itself which is infringement of copyright).

Goodwill

A further unregistered reputation right is that of goodwill in a business. This is recognised by the public as having certain qualities, which uniquely identify that business and exist even in the absence of trade marks. There is no time limit on the life of this property right and its protection is enforced by the English common law of 'passing off', which forbids a third party business from representing itself as having reputation qualities which have been developed by the consistent effort of another business and are its property. The objective of the law is to preserve this valuable goodwill from damage and injury by misrepresentation, with consumer protection from deception being a secondary issue. The usual remedy for such damage is by way of a payment related to lost sales or a royalty payment that would have been due if a licence had been granted by the owner. Other European countries have a similar approach so that the 'get up' or the appearance/ format of a business can be protected. Notwithstanding this protection it would be preferable for a company at least to have registered trade marks in place if entry to a foreign market is planned for the totality of a business.

Forms and protection of intellectual property rights

Patent rights

One of the major subjects of licensing is that of patent rights and a brief analysis of their properties and how legal protection in different jurisdictions is obtained is appropriate. In the United Kingdom patents are governed by Acts of Parliament published in 1977 and 1988. Patents are granted for inventions that are new, not obvious and have never been thought of in the past and are capable of industrial application. Inventions can cover both products and processes but excludes discoveries; theories; artistic, literary, dramatic and musical works (and all other aesthetic creations); schemes, rules or methods for performing mental acts, games or doing business; the presentation of information; computer programs; any variety of plant or animal or biological process (but not micro-biological processes and products which are of great significance for the emerging biotechnology industry,

although there is debate on this principle within the European Union). Patents will not be granted for inventions, which, if they were published or exploited, could encourage offensive, immoral or anti-social behaviour. The inventor is defined as the actual deviser of the invention and in particular involves the inventive concept and the contributors to the inventive concept. The mere contribution of advice and assistance does not meet this definition of an inventor. In principle a patent is owned by the inventor but if they are employed to invent then ownership resides with the employer of the inventor although it is advisable for an assignment document to be signed in favour of the employer. The essential features of a patent which is granted are the absolute monopoly over the invention and the right of exclusion of all other parties from using the invention, as claimed in the patent, which is associated with the monopoly. It is therefore very important that the claims of a patent application be carefully drafted, preferably by a patent agent or attorney so as to obtain the widest possible protection and to cover all the possible areas of use for the concepts underpinning the invention.

International and national patent issues

The European Union

Turning to international patent issues: there is no European Union patent but there is a system under the terms of the European Patent Convention by means of which a single application may be made for a European patent and, following a single examination by the European Patent Office, this can then proceed to issue as individual national patents using the priority date of the application. For licensing purposes the impact of European Union regulations on free movement of goods has to be taken into account when national patents are to be exploited. Another international route for obtaining protection is enshrined in the Patent Cooperation Treaty (PCT): this involves filing a single application which is then subject to a novelty search and, if the applicant wishes, to an international examination (this is known as Chapter II action and effectively allows the national phase to be delayed for 30 months, which can be of value if there is initial uncertainty about the geographical scope of any commercial potential). If this examination is satisfactory and the market data is economically viable then national filings can be made as per the original application, leading to wide international protection being obtained. The cost of obtaining and maintaining wide patent coverage is significant and any envisaged licensing activity must take account of this expenditure when drawing up a business plan. It should also be remembered that it is only the exceptional patent that will be capable of generating revenue throughout its lifetime and even a ten-year period of cash receipts is unusual. One certain consequence of a patent application is the attention that it will draw from competitors both current and future. A familiar claim from research communities is that the patent system stifles the free communication of research findings via learned journals (the readership is usually very limited). The reality is that patents are publications, just as much as a scientific paper, since the only reason for the state to grant a monopoly right is in return for the full and free communication of all the relevant information, albeit in a carefully prescribed format, to the public. The readership of the official patent journals is extensive and guarantees further research either to circumvent the claims of the patent or to solve the problem in another way. Any would-be inventor is well advised to make a thorough search of the patent database before even launching their research or development project, if they are to avoid 'reinventing the wheel'. The stimulus of patents to economic activity is certain despite remarks to the contrary from those who would have a disclosure system without protection for products such as pharmaceuticals.

Some EU member states provide protection for utility models (often described as 'petty patents') through a registration process which gives exclusive protection for inventions but without examination and with a lower level of inventiveness than that usually associated with a patent. The speed of grant and low cost has to be balanced against the lower degree of legal certainty. Efforts to provide a European Union-wide system to cover utility models are still at the stage of consultation and arising developments are likely to take a long time before coming to fruition.

Japanese and American patent law

Although detailed consideration of the variations in national patent law from country to country is beyond the scope of this Report any organisation looking to international licensing as a prime activity must become familiar with Japanese and American patent law given the economic importance of these two markets. The essential features of the US patent system have been briefly analysed earlier in this chapter but it should be remembered that successful European patent action demands absolute novelty: defined as the absence of any prior disclosure anywhere in the world. This is particularly important in the context of inventions made in academic institutions where publication of research results is the expected and accepted route to fame if not to fortune. Such prior publication of an invention within an academic journal or presentation at a conference will inevitably rule out any future patent application from being successful. It is also relevant with respect to third party, non-confidential disclosures, which relate to a possible licence, made before any application is filed. The rule for any licensor should be 'do not make any disclosure without a prior confidentiality agreement and preferably do not disclose anything before making a patent application'.

Infringement

One consequence of these differences that can affect licensees is the issue of infringement, which may vary from country to country and thus give rise to disputes requiring expert legal advice and the related costs for their resolution. As a result of basic scientific research projects, and especially for fast-developing subjects such as biotechnology where there is significant commercial interest in establishing a competitive advantage, the following question often arises: 'Can I licence an invention before a patent application is granted?' The pertinence of this question relates to the lengthy period of time, often three years or more, which can elapse between application and grant of a patent. A potential licensee has to assess the risk that the patent will not issue, against the strength of their commercial position from being the leader in a particular field.

In general, infringement of a patent application is not possible with the significant proviso that, where official publication occurs after a specific period of time from the application date, damages could be awarded as from this publication date if any infringement occurs before the eventual grant date. Any contract that is based on a patent application must be drafted to take account of the possibility that the patent might not be granted, in which circumstance the licensee would wish to be free of any continuing obligation to make payments to the licensor and probably terminate the licence forthwith.

Trade secrets and know-how

Another category of confidential information, which is frequently the subject of licensing agreements, deals with trade secrets or know-how. A concise and uniformly accepted legal definition of these terms is not easy to achieve. As an illustration, guidelines published by the Commission of the European Union (this is the executive body which drafts proposals for legislation) state that know-how is 'non-patented technical information that is secret and substantive'. Note the emphasis on the word technical. In the United States in contrast it is defined in law as being 'information, including a formula, pattern, compilation, program, device, method, technique or process'. Academic jurists do not always agree as to the rights attached to such information but since governments are happy to tax transactions involving know-how and trade secrets then it is safe to assume that they are property. Their protection arises from contracts dealing with their transfer from one party to another and hence breaches of confidentiality are in effect breaches of contract, with the application of the provisions of the relevant laws to remedy such breaches. The secret nature of this information is such that unauthorised disclosure or use can damage the owner and hence lead to court action to redress this situation. One obvious difficulty that arises with this type of information is that it usually resides with specific individuals and unless it is

put into clear written form, being both marked and clearly understood as confidential, then it may not only be difficult to define but impossible to recover if in the hands (or minds) of a third party. There is no doubt that know-how can have immense value and, provided that it remains secret, it can last forever. This may well be an unrealistic expectation. The decision to keep information secret, as opposed to seeking formal protection via a patent, is not always easy to make in view of the critical role played by individuals in either creating know-how or making an invention. There can be difficulties if restrictions are placed on employees, possessing and being the originator of this know-how, leaving an employer to work elsewhere, thus leading to restraint of trade. European nations tend to protect know-how by laws of unfair competition.

In the United States trade secrets are protected either by the law of tort or by contract law and such is their importance there is even an Act of Congress, the 'Uniform Trade Secrets Act', in which they are defined as being information with 'independent economic value' derived from 'not being generally known to' or 'ascertainable by' persons who can profit from its disclosure or use. It is the very fact that such information is unknown by others that leads to much of its personal value being lost to the owner as soon as it becomes public. The implication for drafting licensing agreements with a substantial know-how element is clear: provision must be made for the agreement either to terminate or to have revised royalty terms if the information legitimately becomes public and is no longer secret. Few licensees will wish to continue making payments if the essence of the agreement disappears. Great care must be exercised in this matter in the United States as patents must disclose the best mode of carrying them out and, although patent applications are confidential, the owner has to decide before grant if they wish to disclose what has hitherto been a secret or to abandon the application. The danger for those inclined to want the best of both worlds is that a failure to describe the best way will render the patent invalid. In contrast the risk for any person who knowingly uses the trade secret of another is that of punitive damages being awarded by the courts in the event of conviction. The message for all who have an interest in licensing is simple: if information is regarded as being secret then it must be identified as being and kept secret.

Copyright

Copyright is only available for original works, which means that they originate from the author. As mentioned earlier English law recognises the author's skill and effort in creating the work but does not require that there is any aesthetic or creative merit. This is not the case for continental Europe and has led to much debate as to whether or not there is copyright in information that has been tabulated or compiled. Laws on copyright are essentially national in nature but basic standards for copyright protection have been established by international conventions. As an example EU law has identified software and databases as being subjects of copyright. One point for the author of a copyright work: mark the publication with the recognised international items of: ©/full name of author/year of initial publication. This makes it perfectly clear that the published work is regarded as having copyright status and hence is protected from unauthorised copying. In general there is no requirement for registration of copyright although deposition of a work with an official body or perhaps sending it by post (thus giving date evidence) in a sealed envelope to a lawyer for safekeeping may provide some comfort to an author. An interesting new development in the UK has seen the recognition of a 'moral' right of a copyright author to be identified as being the author. This means that they will have control over the work with respect to any proposed changes e.g. a book being turned into a film script or abbreviating a document such as a manual. As the period of protection extends beyond the author's lifetime there is an obvious need for copyright ownership to be clearly identified when an estate is to be inherited. Assignment can help in avoiding these potential difficulties between authors and owners.

The US legal system requires registration of a copyright work with the Copyright Office if an action for copyright infringement is envisaged but the basic point for all owners is the need to prove that copying has occurred and this is not always easy to achieve. In the UK example cited above regarding the copying of maps one crucial feature was the presence of very minor, deliberate 'mistakes', known only to the copyright holder, in the original document. Unauthorised reproduction repeated these 'mistakes' and, just like a human fingerprint, identified the author's original work. There is one general exception to this approach to the rights of authors and that deals with so-called 'fair use', so that making a copy in whole or in part for activities such as criticism, comment, teaching etc., will not be an infringement of copyright; needless to say such 'fair use' must not lead to economic gain. One subject of copyright, to which we shall return, is that of computer software which is the subject of worldwide licensing activity with the subject matter being the object code as opposed to the source code. Software presents special problems to licensor and licensee alike, especially in respect of infringement actions where the 'look and feel' of computer programs is basically similar.

To close this discussion of copyright works mention must be made of the specific protection provided for the 'masks' used to make semiconductor chips (a facet of copyright not envisaged prior to the invention of these devices). US law has recognised that a new form of property right, effectively lying somewhere between a patent and copyright, should be created for these original 'masks', which enable three-dimensional patterns to be created in 'metallic, insulating or semi-conducting material' so as to make the chip. Registration is required within two years of the date of first commercial exploitation and protection lasts for ten years

as from the date of registration or the date of commercial exploitation anywhere in the world. The protection covers both reproduction of the mask and the sale of chips incorporating the mask work.

Registered designs

The protection of design rights by formal registration is to be implemented by 28th October 2001 in Member States of the European Union following the publication of the EU Designs Directive 98/71/EC. The right conferred is that of exclusive use of the design and hence third party infringement can now be pursued by the owner. One feature of the new system is that of a twelve month grace period during which public disclosure will not destroy novelty. This will allow market testing to occur without losing priority for the product. Design is now defined as 'lines, contours, shape, texture or materials of the product or its ornamentation' but no longer has to have 'eye appeal'. The design itself is registered and protects any product incorporating the design. Designs have to be 'new' (differences in immaterial details from prior designs does not constitute newness) and have 'individual character' (a different overall impression has to be made on the informed user). In general, designs whose appearance is controlled by function cannot be registered.

Trade marks

Trade marks are the final subject to be considered in this overview of intellectual property rights, which can be licensed as an element of an overall commercial exploitation strategy. The legal definition of a trade mark in the UK is any sign that can be represented graphically and is capable of distinguishing the goods or services of one business from those supplied by another. In the USA service and trade marks are defined separately, with the former identifying a source of services and the latter the commercial origin of goods, but the protection process is similar. Commercially these distinctive characteristics are known as the 'brand' to which value is attached to such a degree that the balance sheets of companies show them as assets, albeit intangible ones. The owner must intend to use and preferably have used the mark in a business operation within each country where registration is sought. Examples of marks include: words, letters, numbers, designs and shape of packaging and goods, smells, colours and sounds but generally exclude the designation of kind, quality, quantity, intended purpose, value, geographical origin and time of production. Registration with the UK Trade Marks Registry, which involves a priority search process, gives an absolute and exclusive monopoly right for the mark in relation to the specified goods or service and consequently there is no need to prove reputation and goodwill for the registered mark should there be any infringement. This protection is granted for ten years initially but is renewable indefinitely as long as the trade mark is in use. It is customary for the mark to be shown as the letter R within a circle. In the USA protection is for an initial 20-year period and renewable thereafter provided that use is continuous; goods can be accompanied by an official trade mark notice.

In contrast, unregistered marks require the owner to show that any alleged infringing act has deliberately confused customers, damaged the owner's business and the infringing business has thus benefited from the reputation and goodwill associated with the mark. In the UK the legal action used to protect registered and unregistered marks is known as 'passing off', which basically means an act of misrepresentation that goods of one person are connected to those of another person. In other countries and in general the laws of unfair competition are used to enforce rights. Registration of trade marks with the Customs Service in the USA has two beneficial effects for trade mark owners: firstly, federal legal action will occur for alleged infringement and secondly customs officials can prevent the importation of counterfeit goods or of goods bearing marks designed to confuse the consumer and also seize them.

The legal basis for licensing

As shown above there are a wide variety of rights associated with a number of intellectual property forms. It is also clear that with some rare exceptions these rights can only be enforced in national jurisdictions with the consequence that such enforcement action will require expenditure by the owner. These expenditure levels can be significant: for example the cost of US patent defence in response to infringement can readily amount to one million dollars. Prudence demands that any licensor makes financial provision for such costs, in addition to the substantial ones arising from the complex and lengthy process of creating and formally protecting intellectual property rights on an international scale, when drawing up a business plan for a licensing activity.

In 1993, Ian Harvey of BTG plc drew up a list of the major points to be considered when trying to quantify the risks of a licensing business based on a portfolio strategy designed to both limit and spread risk. These include: not all inventions can be patented; not all patents can be licensed; not all licences lead to products; many products fail to make an impact in the market; successful patented products can lead to infringement; infringement can lead to a failure to receive royalties from licensees who argue that they are suffering from the infringing behaviour so long as it continues; the absolute necessity for auditing licensees to ensure that royalties are properly computed and paid. All these factors are related both to sunk expenditure, which is not investment as the costs, like equity, have no guaranteed yield, and to the possibility that commercial success will not occur despite the expenditure incurred. The message is clear: adopt a portfolio approach to licensing so that the potential of high rewards can offset the significant chance that many projects will not even cover their costs. This is not dissimilar to the management of petroleum and mineral exploration, where many holes have to be drilled before the strike is made, and to venture capital investment where sound risk management leads to rules such as: invest only 10% of a fund in any given sector and no more than 10% in any one company within that sector. Markets are to be viewed regionally rather than nationally and technology markets in particular should be treated as being global. Legal protection programmes for intellectual property, despite their cost, have to reflect these facts of life. To complement this legal attitude market estimations have to be attempted even for brand new ideas where data is difficult to obtain. Without this information even a basic draft business plan is impossible to compile and the economic justification for expenditure cannot be made. Any thought of licensing has to be abandoned.

Licensing is essentially a contractual process in which the owner of the rights transfers them for specific purposes and for due consideration to a third party in whose hands profitable commercial exploitation is judged to be more likely than by using any other route. Licensing monopoly rights for commercial gain has to contend with the equally strong but opposing requirement that competition should be free and fair. The legal process has to balance these forces and in reality this means that national and regional laws have been drafted and approved to ensure that licensing contracts do not lead to illegal actions. These acts are known as anti-competitive, a European epithet, or anti-trust, a US legal term, and such behaviour is judged to be detrimental to the citizen's consumer interests. The relevant laws and their impact on the permissible terms of a licensing contract will be reviewed later in this Report.

It is not a strict legal requirement for licences, with the exception of registered trade mark licences, to be in writing for them to be effective, but it is strongly recommended that such agreements are only made in writing. A corollary of this feature is that informal arrangements or personal conduct can lead to an implied agreement being created and both of these can have contractual effect. This should be interpreted by any potential licensor or licensee as a recommendation of the care to be taken when discussing licensing deals and ensuring that only the final written contract document gives effect to the licence. As an additional point to this need for written documents it should be noted that any assignment of statutory and registered rights must be in writing for the assignment to be effective i.e. that legal title to the right has been formally transferred. This is particularly important when patent licensing involving third party inventors is envisaged and where another party has provided the inventors' funds. To illustrate this point consider academic institutions which may have been funded for a particular area

of research over many years by various sources leading to genuine confusion as to who owns what property rights.

Another feature of licensing is the frequent practice of assembling a number of rights into a single package so that there is synergy between them. A patent and related know-how may be underpinned by a design, supported by copyright and associated with a trade mark, the whole forming a complex but strong variety of rights with considerable licensing potential. Although the basic principle of having valid access rights to potentially valuable intellectual property is probably just as important as ownership rights, there is a clear legal interest in the status of the owner when licensing of patents and copyright is envisaged. The exact position of an employee inventor must be defined in respect of patent rights if argument and even dispute is to be avoided as to whether or not the invention has been made during the normal duties of the employee as defined by the employment contract. Typically scientific and engineering personnel are employed to make or bring about inventions and there will be little doubt as to the employer's ownership rights but if an invention is made outside working hours and in a field unrelated to the employer's business then the situation is different. Another factor is the right of an employee to participate and to what degree in the economic benefit accruing to an employer from the commercial exploitation of a specific invention. How are the benefits arising from licences considered in this respect? In general it is better for ownership to be undivided so that the licence can be kept as simple as possible; even if this desire is simplistic and possibly unrealistic the sentiment is understandable. Documents must be drawn up to testify to ownership when the licence terms call for specific warranty statements on ownership. If joint ownership exists then one direct statutory consequence is the requirement that any licence contract must be agreed to in writing by all owners for it to be effective. Such agreement is most unlikely if there is not a parallel agreement, signed at the same time, to share equitably all arising fees and royalties. If at all possible arrangements should be made using assignment procedures to transfer ownership to one entity. This will ensure that future complications, which could arise from multiple ownership of the rights, can be avoided.

Along with ownership the problem of the legal maintenance of rights by making the appropriate statutory payments also has to be taken into account, especially when a number of countries and licensees are involved. Again it is preferable whenever possible for the owner or his agent to deal with these matters and for complete records to be maintained along with a diary of 'action' dates. Failure to meet a renewal deadline will be fatal to the continuing existence of legal protection and almost certainly fatal to any related licence. Any change in the ownership either of the rights or of a licensee company is critically important in licensing, as each party is no longer dealing with the original signatories to the deal. Therefore provision has to be made in the agreement as to the destiny of a licence in these circumstances. Some quarters would hold that termination should be automatic upon change of ownership of a licensee as the original economic conditions that led to the licence being granted are no longer operative. This is a somewhat extreme view but at the very least the licensor will wish to have the right to review the terms of the contract, if not to recover the property concerned when a licensee's legal status changes. Responsibility for any legal action in relation to patent infringement is also dependent on ownership. In the UK the statute defines a proprietor of a patent to be 'the person who is the owner of the patent in law' and, with the exception of an exclusive licensee, it is the proprietor alone who can sue for alleged infringement by seeking a restraining injunction to stop the infringement and then claiming judicial awards for damages. As registration provides prima facie evidence of the patent and its ownership, it is recommended that potential licensors register their legal interest in patents, as a failure to do so may restrict the damages available in any infringement action. Failure to register may also complicate life for a patentee if the patent is to be used as security for a mortgage or debenture.

These general legal points constitute the framework within which a licensing business has to operate and although the details require action by suitably qualified and experienced lawyers the overall context is that of a set of commercial objectives designed to produce revenue from exploiting intellectual property rights. Within this commercial exploitation context there are a number of alternative courses of actions and the next chapter will put licensing into its proper place. In essence it is but one element of strategic alliances, which can be created as a means to significant business development by collaborating with other parties having complementary assets or resources.

Licensing and business strategy

LICENSING AS A COMPONENT OF BUSINESS DEVELOPMENT The costs of protection and the maintenance of rights



Chapter 2: Licensing and business strategy

Licensing as a component of business development

Entering a new market

To put licensing into context let us consider for a moment the case of a company wishing to enter a new market, perhaps one in another country, or to develop a new product or process. It has a number of options available as to the steps it can take in order to satisfy its future needs, with a major emphasis on creating some form of strategic alliance with one or more third parties. Such alliances offer the opportunity to benefit from the skills and experience of others or to obtain access to valuable assets such as tangible capital or intangible intellectual property rights. Firstly, it can seek out a joint venture partner possessing assets complementary to its own so that together the partners can collaborate for a specified period of time and develop commercial solutions to their problems. This is not a simple process and the creation of the company vehicle, which will constitute the joint venture, has major legal and management implications and any agreement must also define shareholder rights. At the operating level the issue of overall managerial responsibility for the new company has to be settled. One other major issue concerns the terms for ending the venture and the residual rights of all the parties upon termination with respect to the property they have created or acquired and particularly intellectual property rights which will continue to exist. Other alternative courses of action exist in order to penetrate a new geographical market. For example, a company can decide to manufacture the goods at its home site and export them for sale via its own sales personnel or a local agent, who has the appropriate contacts, or a local distributor, who already has established the necessary sales network and can thus rapidly put the goods onto the market. Another alternative is to establish and finance a new manufacturing plant within the new market area to produce and sell the goods directly; such a decision requires great confidence that the investment required will produce acceptable returns when compared with those obtainable from pursuing other opportunities. A variant on this latter course of action is to identify a suitable subcontractor and let them manufacture the goods on behalf of the principals, who then concern themselves solely with creating a suitable mechanism for the distribution of the final product.

Creating and developing a new or improved product

If on the other hand a company recognises that it needs to create and develop a new or improved product or process it will have to decide whether or not to expend money on a research and development programme which, if successful, will satisfy this need. Such an effort is not without risk as the outcome is uncertain and the degree of uncertainty all the greater if the investigation has to start from a position where knowledge and understanding is limited or the initial phase is exploratory in nature. A further factor of relevance is the overall cost of such development exercises: it is widely accepted that if the research phase costs one unit of expenditure then development will require at least another three units without having the assurance that success will occur. To make the final product on a commercially viable basis the final cost can be 20 times that of the research phase. For sophisticated products such as new pharmaceutical drugs, where the inventive phase is followed by extended testing so as to obtain the necessary regulatory approval before making the product available to a patient via a prescription, this overall cost can be a multiple of 100 times the initial research expenditure. The timescale for this process is typically about 12 to 14 years, with a high risk of failure in the early stages. To embark on such a project requires inventive and creative personnel and demands significant cash assets as well as a strong nerve, particularly on the part of the company's financial director. Might it not be more sensible economically to avoid a significant part of this expenditure and also reduce the development time and risk by arranging access to the new technology and related know-how via a licensing deal with the originator? From the standpoint of the creator of the intellectual assets, who may lack the financial reserves and the commercial management skills to move from the development phase to full production and sales, offering a licence can provide both an immediate payment plus a continuing source of revenue if commercial success is achieved by the licensee. With this cash they in turn can finance investigations into other areas of opportunity using their inventive skills. Both parties appear to benefit from such an arrangement. Licensing can also provide another answer to the manufacturing problem by identifying a third party company with the requisite manufacturing facilities and providing it with the necessary instructions via a licensing agreement to make the product(s) to the required standard. In return the licensee will remit at regular intervals a percentage of the sales value of the goods to the licensor. Both these examples show in principle how licensing can lead directly to economic growth both locally and on an international scale.

Statistical evidence

Statistical evidence gathered by the Organisation for Economic Co-operation and Development (OECD) and the International Monetary Fund (IMF) shows the geographical extent, financial impact and growth of these activities. In 1989 OECD estimates of the value of worldwide, internationally traded, intellectual property were in excess of \$30 billion and if one assumes that an average royalty on the sales price of only 5% has generated these figures then the goods related to them would have a value of at least \$600 billion. Ten years later IMF figures for 1999 showed how important this trade had become: the USA alone had receipts of \$36 billion and expenditure of \$13.3 billion for intellectual property trade giving a net surplus of \$23.3 billion. In comparison the United Kingdom had receipts of \$7.1 billion and expenditure of \$6.2 billion for the same type of trade. Any doubts on the value of licensing would appear to be confounded by revenues of this magnitude and a singular feature of the last ten years has been the establishment of companies whose sole activity is that of intellectual property trade in an international market.

Monopoly grants

The creation of legal systems whereby monopoly rights are granted to those who develop original concepts with practical value was based on the philosophy that economic development would result which was of overall benefit to society. This benefit was held to outweigh the possible disadvantage of restricting competition because of the monopoly grant. Nevertheless it is difficult to separate the personal benefit from the societal benefit. To look beyond personal gain from commercial exploitation one has to consider the more general advantage that stems from the diffusion of new knowledge by licensing intellectual property rights. Although difficult to quantify the value of this diffusion is beyond doubt. Two examples from late 20th century developments support this assertion: the growth of the personal computer market over the last 30 years and the dramatic rate of growth in the field of biotechnology which can be traced to the Cohen/Boyer patent on gene splicing. This latter patent was widely licensed as a direct means of spreading knowledge of fundamental importance to the disciplines of bioscience and genetic engineering and creating new therapeutic compounds. It is this power both to distribute the knowledge and to stimulate new research which gives an extra dimension to the value of licensing. Explicit recognition of this effect is to be found in European Union research programmes, typified by the 'Framework' programme, which in 1995 had a four year budget of 13 billion euros, where a significant portion of the contractual documents are devoted to ensuring that the commercial exploitation process of licensing is used as a means of spreading information on the research findings throughout Europe.

The costs of protection and the maintenance of rights

All parties with an interest in exploiting intellectual property rights must take into account two categories of cost when drawing up a business plan to assess the viability of such a course of action. One deals with obtaining legal protection via a registration system and then keeping them in force, the other with enforcing the rights in the face of those who either infringe these rights or choose to ignore them. The former are essential and inevitable, the latter are avoidable in principle but regrettable in reality. Protection costs consist of official fees, which tend to increase with inflation. They are revised regularly and are payable to national registration offices at various stages in the formal process, ranging from initial application to grant via search and examination procedures. To these must be added the much higher levels of professional fees charged by lawyers and other legal advisers for drafting the formal documents and in particular the detailed patent claims. It is common practice for patents to be protected in the major industrial nations, as exemplified by the G7 group of countries, but the potential offered by heavily populated, developing regions such as China, India and South-East Asia, Brazil etc., means that they must be included in any comprehensive protection plan. After grant, regular maintenance fees have to be paid in each country where the rights are to continue in force up to the date when they expire. More realistically patent rights tend to lose their commercial value with time, usually as the result of new, competitive patents eliminating the advantages of the original patent, and hence maintenance fees will no longer be worth paying. It is difficult to quote exact, detailed figures but current estimates of these 'official' costs for worldwide protection are of the order of £50,000 for each patent. If defensive action is needed then costs will escalate to such a degree that in the USA they can readily exceed \$500,000, mainly as a result of the pre-trial process known as 'discovery'. These costs explain the readiness with which both plaintiffs and defendants come to a settlement before the stage of a full trial is reached; usually by some form of licence or cross-licensing arrangement and by making appropriate payments as past royalties or for a future licence.

Another factor to be taken into account is the long time needed for these court actions to be resolved. It is not unusual for a complicated patent case to take three to four years before judgment is passed. This explains why a restraining injunction is the first act to be taken, as it is possibly more valuable to stop infringement from continuing than to await the payment of an undetermined sum, which in the UK is essentially based on a compensation for loss rather than on a punitive basis, at some distant date in the future. It is of course possible to use an arbitration process to settle a dispute but even this approach is likely to leave all parties being discontent, especially when the costs of arbitration are deducted from the final settlement. Any potential licensor should make budgetary provision for these costs but be determined to limit them to the absolute minimum necessary for commercial success and to be flexible in their negotiating stance. Always remember that money today is worth more than tomorrow, especially when tomorrow is some years ahead.

How to identify a licensor/licensee

WHY DECIDE ON A LICENSING POLICY?

WHERE SHOULD A LICENSEE LOOK FOR AN OPPORTUNITY?

WHAT QUALITIES MUST THE LICENSEE HAVE IN ORDER TO HAVE SOME HOPE OF SUCCESS?

ECONOMIC ASSESSMENT OF LICENSING OPPORTUNITIES

WHAT IS NEEDED TO IMPROVE YOUR CHANCE OF SUCCESS?

THE CAN-BALANCE PERPETUAL BALANCING SYSTEM



Chapter 3: How to identify a licensor/licensee

There are two prerequisites for successful licensing: the identification of a sound, well-protected opportunity and either its owner or its eventual user. Every licence needs two parties: a licensor and a licensee. The owner of a potential opportunity has a number of alternatives to consider: exploit it but do so in secret even to the extent of keeping all the details secret; sell it outright, provided its real value is known, which is rarely the case; find a joint venture partner who possesses either financial or commercial resources and with whom you can collaborate; do nothing until either the market appears to be more valuable or develops into a recognisable structure; file it away as the economic facts do not justify exploitation; launch a licensing project etc. On the other hand a party in need of new opportunities has other choices to make: it can try to develop new projects from internal resources; it can attempt to survive by squeezing every last drop from a current product line, possibly with third party arrangements; or it can seek out a willing licensor and negotiate a deal.

Why decide on a licensing policy?

The potential licensor may have a number of reasons that lead them to decide on a licensing policy. First and foremost they are looking to receive a regular revenue stream from a combination of licence issue fees, annual maintenance payments and royalty payments based on the sales value realised by their licensee(s). They may also be looking to supply technical support to licensees and to receiving further revenue from such services. There is also the possibility of related, royalty-free improvements being granted back from their licensee on a non-exclusive basis. The sale of products and services may only be possible if enabling licences are granted. Offering a licence may be needed to settle a patent dispute without having to resort to more formal legal process and incur unnecessary expense. A similar set of reasons can be drawn up for a licensee.

Foreign licensing

One further dimension is provided by foreign licensing in that it falls midway between direct or joint venture manufacture on the one hand and export of product
from the home manufacturing unit on the other. Its relative profitability and practicability will depend on a number of factors among which can be numbered:

- 1. Governmental controls and regulations;
- 2. Shipping and available local raw material costs;
- 3. Local distribution, sale and product specification requirements;
- 4. Amount and cost of capital for a foreign operation and fiscal charges;
- 5. The breadth of patent coverage and presence of licensees capable of exploiting the patent whilst maintaining the necessary quality and reputation standards.

Common questions

Both parties to a licence deal will have made or should have made detailed studies of the opportunity in terms of the target market to be served, the strength of the intellectual property rights in question and the related expenditure levels and arising income to be generated over the duration of the licence. Two basic questions must be answered:

- 1. How do I locate the opportunity?
- 2. How do I find my partner?

In order to locate the opportunity it is obvious that knowing where to look is important but equally important but less obvious is the need to recognise the potential of an opportunity when it is not well-defined, often incompletely understood and frequently exists only as a prototype of doubtful pedigree. The other problem concerns the common human failing of being reluctant to appreciate fully that which has been invented elsewhere and especially so when a company has major R&D facilities and a good record of new products and processes resulting from this expenditure. Committees, as exemplified by conservative boards of directors, are notorious for their ability to find reasons for not pursuing a particular course of action and even for not doing anything novel at all.

David Mooring of Pax Technologies (UK) has drawn my attention to comments made by Isambard Kingdom Brunel, who was a distinguished and innovative Victorian engineer. They illustrate perfectly this point. He described the attitude of a UK government department to innovation in the following terms: 'they have an extraordinary supply of cold water and capacious and heavy extinguishers... an unlimited supply of some negative principle which seems to absorb and eliminate everything'. Brunel was not alone. Alexander Graham Bell, the inventor of the telephone – a device that he thought would be of help to the deaf – had his proposal to offer an exclusive licence for \$100,000 rejected by Western Union Telegraph, the dominant company of the day. In more recent times Charles Carlsen, the inventor of xerography, had to create and develop the commercial copying market himself, in the face of an absolute rejection of his new machine by all the large corporations he had approached. As an aside it is interesting to note that the commercial success of Xerox stemmed from the decision to rent rather than to sell machines and take a royalty on all copies made with the machines, into which were incorporated simple metering devices. Patience is clearly high on any list of the many attributes of a licensor.

Where should a licensee look for an opportunity?

The list of sources is lengthy:

- Specialist publications detailing both requests and offers;
- The network of local and international Chambers of Commerce provides extensive contacts across industries and continents;
- Industry-specific and trade associations usually support their members by both licensing-in and licensing-out activities;
- Governmental initiatives tend to be on a regional basis supplemented by embassy-organised efforts to promote international trade;
- Trade fairs and 'technology transfer' events often focus on technology licensing as a means of promoting economic development exercises, with the European Commission encouraging the commercial exploitation of European Union funded research results via such events (the contracts drawn up to provide finance for these programmes specify with great clarity the rights to arising intellectual property and state that licensing is a preferred exploitation mode so as to ensure the widest possible diffusion of the research findings);
- Private research institutes and universities are increasingly recognised as the source of early-stage research findings, which offer the chance to companies with strong nerves to invest in future technologies at the nascent stage by licensing patent applications;
- Licensing brokers and specialised licensing companies have come to the fore in recent years as being one of the most attractive sources of licensing opportunities as they filter out the non-viable and can offer a portfolio approach to their clients; private inventors can provide licensable technologies but the likelihood of finding major new developments is not high as they require significant expenditure which is usually not within the financial means of the average lone inventor.

Given this mine of potential projects the typical licensee will recoil in horror at the time needed to assess each opportunity and this presumes that each one is adequately described and is not misleading in its claims.

What qualities must the licensee have in order to have some hope of success?

A licensee must be well briefed as to what they are seeking and be both patient and persistent. These attributes must be allied to realism as to the level of possible returns and the timescale needed to convert the new acquisition into profitable sales. Above all they must recognise that the statistics of success are not weighted in their favour, as my personal experience confirmed.

During an eight-year period of investing in early-stage projects with intellectual property assets a company, for which I was responsible, made detailed assessments of 456 projects, selected 47 for investment and realised a positive return on twelve, with two licensed projects generating multi-million pound sterling sales value. Other companies operating in a variety of countries have shown very comparable data to this example. The degree of risk implied by these and other statistical data demands that a portfolio approach be adopted by any investor in a licensing business if they are not to feel like a casino gambler with the odds always in favour of the house. Any sensible analysis of an opportunity should be accompanied by a business plan, even if this is only in outline form and contains best/worst case estimates for the various categories of income and expenditure.

Economic assessment of licensing opportunities

Morphological analysis

Any assessment of licensing or other business opportunities will have to be made in the light of the commercial strategy and policy of the individual company. To that extent, such assessments will be subjective and hence may be judged to be lacking in objectivity. Methods of reducing this subjective element will be of value and it is in this light that an analytical approach developed in France has been put forward for consideration. The technique, known as 'morphological analysis', describes the anatomy of any business activity by specifying a number of factors, covering technical, commercial and financial issues. Each set of factors can be assessed and weighed in relative importance (on a scale of 0-9) for any particular product made by the company. The accompanying matrix details these factors. In practice, each activity will have a characteristic profile; every company will also have its own specific profile. These morphological profiles will identify where any one company stands in comparison with others. Any opportunity can be described in a similar way and its profile compared with that of the company. Deviations from the main profile will allow the company to conclude that an opportunity may well be moving the company away from its strengths and hence into a situation of higher risk.

This approach attempts to introduce a logical method by which companies can be compared and also enables a company to assess the compatibility of a new opportunity with its current operations. It will also show clearly when a proposed activity leads to manifest diversification and hence to possible problems, unless the company fully appreciates the nature of the new activity and makes the appropriate management changes.

				1	2	3	4	5	6
A		Size of company	Turnover (MF)	<1	1-10	10-100	100-1000	1000-10.000	>10.000
В	~	Level of integration	Turnover/purchases	<1.3	1.3-2	2-4	4-10	>10	
C	NON	Labour intensity	Value-added per capita (KF)	<100	100-160	160-250	250-320	320-500	>500
D	CO	Capital intensity	Turnover/fixed assets	>10	6-10	3-6	1.5-3	0.5-1.5	<0.5
E	Ē	'Entry ticket'	Minimum investment (MF)	<1	1-3	3-10	10-30	30-100	>100
F		Standard invoice	Unit price or average invoice (KF)	<0.01	0.01-0.1	0.1-1	1-10	10-100	>100

	1					1			
G		Market size	Market size (MF)	<10	10-100	100-1000	1000-10.000	>10.000	
н		Competitors	Structure of competition	V. DISPERSED	DISPERSED	CONCENTRATED	V. CONCENTRATED	MONOPOLY	
I		Customers	Structure of clientele	V. DISPERSED	DISPERSED	CONCENTRATED	V. CONCENTRATED	SINGLE CLIENT	
J		Customer location	International activity	NIL	LOW	AVERAGE	HIGH		
к		Product engineering skills	Skill level	NIL (commodity)	LOW (consumables)	AVERAGE (machine tools)	HIGH (pharmaceuticals)		
L	ARKET	Product standardisation	Standardisation level	TOTAL (bolts)	AVERAGE (transm.belts)	LOW (computers)	NIL (high fashion)		
м	Σ	Access to decision-makers	Accessibility	EASY	AVERAGE (automobiles)	DIFFICULT (ind. products)	COMPLEX (urban transport)		
N		Frequency of purchase	Repeat orders	V. HIGH (cigarettes)	HIGH (clothes)	AVERAGE (cars/ machine tools)	LOW (telephone exchanges)	V. LOW (bridges)	
0		After-sales service	Service	NONE	AVERAGE (automobiles)	HIGH (computers)	COMPLEX (aeroplanes)		
Р		Life of product	Life of product	CONSUMABLE (food)	SHORT (clothes)	AVERAGE (appliances)	LONG (machine tools)	V. LONG (motorways)	
٥		Functional complexity of product	Ease of demonstration	V. HIGH (ballpoint)	HIGH (dom.appl.)	AVERAGE (fork-lift)	LOW (computer)	V. LOW (air traffic control)	

R		Logistical requirements of product	Price per kilo (FF)	<3	3-30	30-300	300-1000	>1000	
S	~	Production management	Production management	STOCK	ORDER	PROGRAMME			
т	00	Autonomy of personnel	Autonomy of personnel	HIGH	AVERAGE	LOW			
U	INOL	Diversity of personnel skills	Diversity of skills profiles	LOW	AVERAGE	HIGH			
v	TECH	Rhythm of production	Size of production runs	UNIT	SMALL	MEDIUM	LARGE	MASS	
w		Production type	Production type	SIMPLE PROC.	ASSEMBLY	SERVICE	CRAFT	SITE	
x		Technological level	Technological level	NIL	LOW	MEDIUM	HIGH	V. HIGH	

FF: French Francs KF: thousand FF MF: million FF

The method is useful insofar as it encourages rational thinking rather than inspired intuition, when assessing the desirability of any specific opportunity. In particular it makes clear to the business analyst the risks implicit in diversification via licensing and indicates what management must do to reduce these risks to more acceptable and realistic levels. In searching for the ideal licensee or licensor it is vital that each party take into account the viewpoint and objectives of the other. In so doing implicit acceptance of a 'win-win' agreement is made rather than exemplifying an 'I win – you lose' philosophy. The aim is not to defeat an opponent but to cooperate with a potential partner, since the licensing agreement is an effective form of strategic alliance in which a licensor places their hopes of future revenue, or at least some proportion of it, in the hands of an independent third party.

Any sensible approach to negotiating a licensing agreement requires an understanding or at least a perception of the basic attitudes of the other side to the essential features of the relationship which will be created by the licence as well as a common understanding of the technical, economic and legal terms which will appear in the agreement. Even the most sketchy of market analyses requires knowledge of an industry sector in terms of the driving forces which will determine financial success including the role and impact of technology, the market dynamics (growing, mature or in decline; national/regional/international; price structure; profit margins; competition; channels of distribution etc.,) and the necessary capital investment base.

The search for the ideal opportunity of high potential economic value is never going to be easy as it is being carried out in response to the recognition that internal development has failed to deliver the future. A rational approach is vital, involving analysis and the identification of specific needs but this does not necessarily mean the right opportunity will be recognised. 'I'm not sure what I want but I'll recognise it when I see it' might be the correct attitude to adopt when searching for a fashion item but it is rarely appropriate when seeking out a new product. David Mooring points out that a new product is rarely put on display in a way which enhances its best features and it is often easier to advance reasons why something should not be done than to take a positive decision. It is also safer for corporate man to avoid a possible career setback by not acting than it is by taking a risk.

What is needed to improve your chance of success?

Two obvious prerequisites can be specified. A search budget and a careful analysis of the background information are essential if there is to be any hope at all of success. If the process is important then high quality personnel need to be assigned to the project full-time. Although new product specification is important it should not be so tightly defined that it results in all opportunities being judged as unacceptable when compared with the ideal. Flexibility and realism are needed, as many potential new products will have to be examined during the search. In view of the statistics of success mentioned earlier it is essential that patience is combined with optimism and committee-based decisions be kept to an absolute minimum. Entrepreneurs are not created by committees, which are expert at the identification of heretics. The mission must be identified and agreed to at board level but its execution then left to the project team.

The following section, based on a document prepared by a manufacturing company, illustrates how a licensing opportunity should be presented so as to make the task of the potential licensee easier to execute.

The Can-Balance Perpetual Balancing System

Executive summary

European Technologies International Inc. (ETI) was formed as a public company for the purpose of marketing the Can-Balance System. The following is a brief overview of Can-Balance's technology and its market.

The Can-Balance Perpetual Balancing System is an advanced approach to the problems of imbalance in rotating equipment. The Can-Balance System can be designed into new equipment or retro-fitted into existing equipment. Perpetual balance is achieved in both small and large applications.

The system adjusts automatically to compensate for variation in rotation speeds (RPM) as well as wear and tear sustained by machinery components such as bearings, during normal operation. Electronic test results on rotating equipment fitted with the Can-Balance System confirm the system's accuracy and flexibility. The Can-Balance System surpasses the balancing ability of any conventional balancing device, and exceeds all current industrial standards.

Characteristics of the Can-Balance System

- The system automatically and immediately distributes the correct amount of weight to compensate for imbalance during rotation.
- By achieving and maintaining balance, the system reduces friction and wear in machine components.
- The system can compensate for worn machine components.
- The system adjusts to external forces within a fraction of a second and continues to hold the rotating equipment in balance.
- The system will replace conventional re-balancing processes that are inefficient in terms of time, expense and machinery downtime.

The Can-Balance market

The Can-Balance System can be applied to new products or retro-fitted to existing rotating equipment and applications are numerous across a variety of industrial sectors, including:

- Automotive;
- Turbines;
- Aerospace;
- Marine;
- Electrical motors;
- Household goods;
- Propellers;
- Heating and cooling fans.

The Can-Balance technology

Balancing problems plague industry, particularly on rotating shafts when imbalance occurs because of imperfections, which are usually extremely minute, in the shaft material or construction. However, when the shaft is rotated at high speeds a portion or portions of the shaft become denser and heavier than others. As the rotation speed increases, the imbalance effect is magnified and causes the shaft to turn out of balance.

A shaft turning out of balance for any length of time leads to excessive wear on the bearings and other critical machine components. If not corrected, the imbalance leads to premature wear, inefficient operation, and eventually machinery breakdown. In the case of cutting tools, imbalance of the tool or turning shaft has a direct and adverse effect on the quality of the cut and the life of the tool itself. A more disastrous effect occurs when turbines go out of balance. As a result of the high speeds at which turbines of all types operate, imbalance often results in complete disintegration of the bearing systems and often the turbine is destroyed or extensively damaged. In addition to unequal weight distribution causing imbalance, turbines also become subject to damage caused by debris carried by the substance (gas, water, etc.) they are propelling. A small fracture or nick in a turbine propeller can cause an imbalance effect, as can the build-up of impurities or debris on the turbine components. Imbalance created by debris on a turbine propeller can also be complicated by the random breaking up and release of debris particles.

Conventional technology to correct imbalance in rotating shafts involves placement of the out of balance machine part between centres on a specialised machine. This machine rotates the object and electronically calculates discrepancies in weight or mass distribution. Weight is then added or removed at specific points on the object as identified by this process until it runs true on the balancing machine. This conventional process is effective but has the following limitations:

- Balancing by this method is time-consuming and not 100% precise. Greater precision in balancing the object requires a significant increase in cost and time;
- The correction of balance is done at a particular RPM. If the rotating part is turning at varying speeds of rotation, either faster or slower, the effectiveness of the initial balancing is diminished;
- The out of balance component must be removed from the machine, installed in the balancing machine to correct balance, and then replaced in operation. This often necessitates back-up or contingency equipment adding significantly to overall equipment costs;
- Once the re-balanced object is replaced in operation, it again becomes subject to exerted forces of inconsistencies in material mass and/or weight distribution and eventually is thrown out of balance again. The entire process has to be repeated, equating to increased down-time and expense.

The Can-Balance technology offers many advantages over conventional balancing technologies. The system is designed to fit onto a shaft or centre of virtually any rotating component. Can-Balance units can be made in a disk, rim or cylinder configuration. They can be added to existing equipment or may, in many cases, be incorporated into the design of the rotating component itself. For an automobile wheel the Can-Balance casing may be incorporated into the wheel rim. Variance in rotation speeds (RPM) does not affect the Can-Balance system.

The Can-Balance automatically and immediately self-adjusts to compensate for changes in rotation speeds. In addition, the system will dynamically adjust and correct any imbalance caused by malfunctions or wear of machinery bearings or other components.

Can-Balance prototypes have been tested using conventional balancing machines with impressive results. Throughout the prototype development process, electronic testing has been done under the auspices and supervision of a major international engineering firm. The results have shown that the Can-Balance greatly surpasses the balancing capabilities of existing balancing systems. The balancing results achieved by the Can-Balance and measured by electronic testing have been recorded to a decimal factor far surpassing any existing balancing system.

Experimental Can-Balance Systems have been tested with excellent results on fans, automobiles, domestic washing machines and compressors. Vibration reductions of 75% are typical. A car in racing trials was fitted with Can-Balance units to compensate for wear and torsional vibration on the constant velocity joints. All test results have been extremely promising.

Theoretically, the Can-Balance System will achieve 100% balance every time, however contributing variables that preclude this are measurement error, machine precision and external vibration. In spite of these variables, all testing applications evaluated to date have indicated that Can-Balance will surpass current industrial standards of imbalance.

Product operation

The Can-Balance technology works by moving compensating masses within it to compensate for the eccentric mass of the rotor. The system's design parameters are tuned to the dynamics of the rotating system on which it is fitted. The Can-Balance System does not require a power supply as the energy to move the compensating masses is transferred from the vibration energy produced by the imbalance.

Because the Can-Balance System is tuned to the dynamic behaviour of the rotating machine, knowledge of the mass, inertia and elastic properties of the machine and its supports is important. Imbalanced systems usually experience a shift in phase lag of the rotor displacement relative to the direction of the imbalance force vector as the rotating speed varies. In the application of a Can-Balance System these changes in phase lag are considered. At low speeds the short phase lag of the rotor displacement and the sensitivity threshold can limit the Can-Balance System's operation. This sensitivity limit depends on the capacity of the system and the dynamics of the rotating system relative to the tuning parameters. This is generally not a problem for variable speed systems such as an automobile wheel

or machines which run-up to speed quickly. The balance compensating function is often not required at low speeds due to the low magnitude of the imbalance forces or the short operating time at low speed. Research is in progress to push the sensitivity limits as low as possible.

The compensating capacity of a given Can-Balance System is a function of the mass of the compensating elements and their radius about the rotating axis. The larger the diameter and physical size which can be accommodated, the higher is the compensating capacity which can be designed into the device. ETI is experimenting with high density materials for the compensating masses to maximise the capacity within a given size envelope. Most machinery tested to date could accommodate a Can-Balance System of useful capacity within the available space.

The device is extremely rugged in nature and has a wide operating temperature range. It is anticipated that, in most applications, it will not require servicing for the life of the machine on which it serves. To date the experimental Can-Balance devices have been made to allow disassembly to change tuning parameters and for inspection. In production it is anticipated that most Can-Balance units would be permanently sealed.

It is expected that use of Can-Balance technology can allow capital cost savings for reductions in rotor mass, reduction of support stiffness, reduction of bearing size etc. In some cases, machine capacity may be increased. Operating cost savings may be realised due to reduced wear and fatigue of bearings, shafts and vibration sensitive components. In many applications Can-Balance is expected to provide substantial life cycle cost savings.

Product development

Various prototypes have been built using different types of materials to determine which material will provide the most precision and durability. Through the prototype development process, the Can-Balance device went through a radical design change that greatly improved the system's overall precision. A significant amount of time has been spent experimenting with and testing the various components of the device. The results of this research and development have led to improvements in the design and construction of the system. Experimental Can-Balance Systems have had casings machined from steel, aluminium, brass and Delrin. For high performance applications, high strength alloys can be used. For low cost, lightweight or corrosive applications the casing can be made from a variety of plastics. Several material options exist for internal components. Maximum speeds are limited only by material stress limits. No restricting size limits are envisaged. The potential industrial uses of the Can-Balance system are wide ranging. A typical industrial application could mean balancing at a very low RPM up to 50,000 RPM. The forces exerted at such high speeds of rotation are tremendous. The prototype development process has identified that precision and durability of the system are critical. Advances in research and development continue.

Patent rights

Application was made for patent in the United States, Canada, and Taiwan in May 1992. Under the terms of the Patent Convention, a worldwide PCT patent application was filed on 20 May 1993. Application for patent has also been made in several other countries not party to the PCT rules and conventions.

The market

The Can-Balance system can be applied to any application where imbalance of a rotating device occurs. As a result, the market for the technology is difficult if not impossible to define. Suffice to state at this time the limited market of gas transmission, automobile, aerospace, industrial turbine and computer hardware industries are immense. Exact quantification of market size at this time is not possible. Examples of potential applications are listed below:

- Automotive (consumer and commercial): engine shafts, wheels, alternators, water pumps, and power steering.
- Appliances (mostly belt drives): washers, refrigerators, and fans.
- **Compressors**: furnaces, motors and fans.
- **Commercial buildings**: air conditioning units, air fans, water pumps, and elevator systems.
- **Transportation (marine)**: engines and turbines, propeller shafts/drive shafts, hovercraft fans, jet drives, miscellaneous hydraulics, pumps etc.
- **Commercial and passenger rail**: engines and turbines, wheels on rolling stock, subways and LRT systems, motors and wheels.
- Aircraft (commercial and military): jet engines, propellers (turbo engines), and helicopters.
- **Industrial (mining and metallurgy)**: truck, shovel and support, draglines, ore movers and drills, conveyors, crushing and grinding, screening, centrifuges, pumps, blowers, fans.
- **Machinery for manufacturing**: saws, cutters, grinders, material handling, drills, lathes.

- **Process (petroleum, chemicals and plastics)**: compressors, turbine drivers, pumps, fans.
- **Pulp, paper and lumber**: paper machines, saws, pulping machines, pumps, blowers.
- Material handling: bearings.
- **Agriculture**: farm machinery, engines, rotating shafts and arms, cutting blades, belt drives, agricultural processing machinery.
- **Construction industry (civil)**: cement plants, asphalt and paving, building materials, excavation, earth moving, drilling, crushing, quarry excavation, material moving, grading and compacting.
- **Mechanical**: tools and equipment, heavy lift and transport, portable power generation.
- **Military**: aircraft, marine, ground mobile units.
- **Printing and publication**: presses, newspaper, etc.
- **Power (thermal)**: material handling: crushing, grinding, blowers, pumps, conveyors, generators and turbines; (nuclear): pumps, turbines, HVAC; (hydro): pelton wheels, generators, pumps.
- **Computers**: hard drives.

Financial issues

THE VALUE OF LICENSING OPPORTUNITIES IDENTIFICATION OF LICENSABLE TECHNOLOGY FACTORS TO CONSIDER WHEN ANALYSING AN OPPORTUNITY INVESTMENT THEORY FOR ROYALTY CALCULATIONS THE TAXATION OF INTELLECTUAL PROPERTY INCOME



Chapter 4: Financial issues

The value of licensing opportunities

There are two crucial questions in licensing both for licensor and licensee alike:

- 1. 'Where can I find a suitable project?'
- 2. 'What value should be ascribed to an available opportunity?'

The latter question will be considered in this chapter.

A variety of factors and principles have been identified as a result of practical experience and this section details some of the more important points in the form of a series of questions. The answers to these provide piece-by-piece data which, when assembled, will give a sound indication of the economic value of a potential opportunity. It must be remembered, however, that this value will change with time, not only in the sense that money now is more valuable than money in the future but alterations in financial factors such as interest rates can critically alter the viability of a project e.g. the need for current cash generated to cover interest payments if a loan has been used as the financial instrument to support a particular deal. Similar considerations arise when inflation is taken into account (as an illustration, remember that an inflation rate of 10% reduces future value by half in only seven years).

The first section deals with the identification of licensable technology both in generic and specific terms and lists potential sources on an international basis without pretending that these are exhaustive in nature. Indeed this is one of the main problems facing the seeker of opportunities; the mine is vast and the valuable mineral veins are rare with little by way of a technology map as a guide.

Identification of licensable technology

Technology does not recognise national or continental boundries and any search for licensing opportunities must be based on the assumption that it will be conducted on a worldwide basis. This vast market can be fragmented into a number of generic sources of licensable technology, which can be classified under a series of headings. The problems for those seeking out opportunities are those of quality and the state of development of the identified project. As a general rule companies offering licensable projects tend to have proprietary products and processes which have already proven their value in-house, although many also offer the results of technology projects which no longer fit in with the current corporate strategy. At the other end of the scale are the academic organisations, which combine teaching with research; they inevitably will be offering the opportunity to follow up early-stage investigations, usually funded by public sector resources, with the risk that the arising results may not lead to any industrial activity. In general the results are accompanied by patent applications filed in the hope that within one year of filing a client, who is willing to fund the next stage including the costs of prosecuting the application to eventual grant, will have been found. The chances of commercial success are of the order of 1% maximum but when success occurs it is on a grand scale, as testified by the record of BTG plc in the UK and over many years in the USA by Research Corporation Technologies Inc. The wide availability of Internet access to potential opportunities has made the search process less tedious but it is still time-consuming and patience is essential.

The search process

PEOPLE: access via personal networks.

- Licensing executives
- Private inventors
- Consultants
- Brokers.

ORGANISATIONS: access via newsletters and websites.

- Professional
- Chambers of Commerce
- Trade associations
- Government departments and trade officers in foreign embassies
- Publishing houses.

PUBLICATIONS and VIDEO: target their clients via selected mail-shots.

- Specialised in nature and usually independent
- Modern approach driven by innovators.

TRADE FAIRS and CONFERENCES: professionally driven.

• Wide range of venues and topics, often specific technology oriented.

ACADEMIC INSTITUTIONS: numerous, increasingly well organised and market aware.

- Highly varied; dependent on major research funding
- Increasing in number and thus require significant investigation time
- Quality issues and state of development need careful assessment.

COMPUTER DATABASES/INTERNET WEBSITES.

- In principle easy to access and rapid as they match requests with offers on a 'marriage bureau' basis but the role of people is still primordial as information alone is usually a necessary but insufficient condition
- Unconvincing track record to date.

SPECIALIST INTERNATIONAL LICENSING COMPANIES.

• Excellent history of success for experienced organisations such as BTG plc (UK) and Research Corporation Technologies Inc (USA).

The geographical diversity of sources of technology

There are many sources of technology that can be accessed by way of a licensing agreement, including established companies wishing to extract value from project portfolios no longer relevant to their main business strategy. These demand some initiative on the part of potential licensees. Expenditure by national governments and related agencies on science and technology programmes often leads to discoveries and inventions with the potential for commercial exploitation by licensing to existing companies. The following names are only illustrative of the geographical diversity of these sources rather than being exhaustive.

- AUSTRALIA Commonwealth of Australia Science and Technology Office, Sirotech Limited;
- CANADA Canadian Patents and Development Limited;
- CHINA Jiangsu Research Institute for Technology Development;
- DENMARK Danish Technology Transfer National Agency of Technology;
- FINLAND Finnish National Fund for Research and Development;
- FRANCE Agence Nationale de Valorisation de la Recherche (ANVAR);
- GERMANY Inventors' Centre of North Germany, Fraunhofer Gesellschaft, VDI Technologiezentrum Informationstechnik;

- HUNGARY Innofinance (General Finance Institute for Innovation), Novex (Foreign Trade Company Limited for International Transfer of Technology);
- JAPAN Research Development Corporation of Japan;
- LUXEMBOURG TII;
- SOUTH AFRICA South African Inventions Development Corporation;
- UNITED KINGDOM Pax Tech Transfer Ltd, BTG plc;
- UNITED STATES Battelle Memorial Institute; International Finance Corporation; National Technical Information Service Center for the Utilisation of Federal Technology; Research Corporation Technologies Inc (Arizona); many academic-based bodies e.g. Stanford University Office of Technology Licensing, MIT(Mass), Technology Transfer Society;
- RUSSIA Licensintorg.

Typical questions to ask when valuing a technology

A number of questions have to be answered in attempting to value a technology, whether one is a vendor or a purchaser, so as to arrive at a price range within which a negotiating position can be situated. The answers to these questions can provide a useful background to the calculation of the up-front fees and royalty rates to be paid by a licensee, although it must be emphasised that the final price will depend on the income to be generated by a licensee. Typical questions include the following:

- 1. What is being offered?
 - Assess the strength and scope of any patent protection.
 - Are trade marks, know-how, and other valuable features being offered?
 - How experienced and helpful is the licensor?
- 2. What expenses are necessary to reach full production?
 - Technical development and quality control.
 - Build a plant and start up production.
 - Train a sales force or a service support organisation.
- **3**. What degree of exclusivity or lead-time advantage is being offered and in what markets?
 - Exclusive, sole and non-exclusive.

- Extent of geographical coverage.
- How long will the exclusive period actually last?
- 4. What is the competition?
 - Competitive products, processes, technology.
 - Royalty rates paid by competitors for similar products.
 - How long before competitors can catch up with the new technology?
- 5. Where is the market domestic or foreign?
- 6. How will the market grow?
 - This year, next year, five years, etc.
 - How much sales promotion and support of services will be required?
- 7. What payments are being made?
 - An up-front lump sum on issue of licence.
 - Running royalties only.
 - Option fee and fully paid up licence fee.
 - Maintenance fees creditable against royalties.
 - Patent renewal fees.
- 8. What is the basis for royalty calculation?
 - Royalty rates inevitably vary from industrial sector to sector and some rates have become common to specific industries. How are they set in practice? A simple rule of thumb such as 25% of the saving produced by the licensee is often quoted so as to set an initial estimate of the volume of cash to be generated, and can be paid as a royalty expressed in terms of sales volume. This at least has the merit of setting a framework within which negotiation can take place.

Factors to consider when analysing an opportunity

Four relevant factors affecting the value of an opportunity can be identified, namely:

- **1**. Economic.
- 2. Legal.
- **3**. Business.
- 4. Technological.

Each factor is presented in the following sections in the form of questions to be answered or as issues requiring resolution if a rigorous analysis of an opportunity is to be made after an initial screening of a number of opportunities.

1. Economic factors

- 1.1 What will be the cost and the profitability to the licensee of commercialising the opportunity?
- 1.2 Will there be a cost saving on current production to the licensee?
- 1.3 What will the licensee have to spend or invest to realise this saving?
- 1.4 Will there be a single, paid-up, issue fee or running royalties based on sales?
- 1.5 Will the use of an invention result in increased sales by the licensee of products not covered by the licence?
- 1.6 Are there tangible benefits resulting from the use of the invention, such as improved taste, quality or appearance, which will result in increased total sales?
- 1.7 As a result of the invention will the licensee be able to increase the selling price of an existing product?
- 1.8 Will the licence make available a completely new product or service for which there is no available substitute and no established price?
- 1.9 Will the royalty be applied to an intermediate product or a final product, to a portion of a device or the whole device?
- 1.10 Is the invention the key to the overall success of the product or merely an improvement in the product?
- 1.11 Are alternatives available to the licensee other than use of the licensed invention and what would be the cost of these alternatives?
- 1.12 What is the anticipated production life of the licence?

2. Legal factors

- 2.1 Do the patent claims cover a product or a method? If a method, is it only one step in a multi-step process and, if so, is it a key step? If a product, is it a finished product or an intermediate?
- 2.2 How broad are the patent claims? Will they cover future improvements in the invention? Do they cover many different applications of the invention? Will the licensee be able to build up an independent patent portfolio?
- 2.3 Is there a single patent or a package of patents? Will the licensee use some or all of the patents? Will the royalty vary with the number used? What will happen as the patents begin to expire?
- 2.4 How long do the patents have to run before expiration? What are the chances that the invention may be made obsolete before the patents expire?
- 2.5 Will the activities of the licensee constitute direct or contributory infringement?
- 2.6 What is the probability that a court would hold the patent claims valid? Have they been tested in a litigation action? Is there any unresolved issue on the patent rights, such as prior art not considered by the patent office?
- 2.7 Will the licensee have to pay any royalties to others for the use of any dominating patents or for patents that are necessary for the practical and economic practice of the invention?
- 2.8 Will it be difficult or impractical to detect or police infringement by others?
- 2.9 Is it likely that the patent rights could be designed around and what would be the cost of this to the licensee?
- 2.10 What are the anticipated royalties to be paid by the licensee and how will these compare to the cost to the licensee of litigating the patents?
- 2.11 To what degree is the licensor prepared to enforce the patent rights in court?
- 2.12 To what extent has the invention been developed? What is the degree of commercial risk associated with its use? Is it already on the market in the form of a viable product?
- 2.13 Are there other outstanding licences under the same patent rights which have established the royalty terms?

2.14 Consider also the legal implications of the following: suspension of royalties in the event that an infringement suit is brought against licensee; disclaimer by licensor of any patent indemnification; arbitration in case of dispute between licensor and licensee; termination of royalty obligation if patent or any of the claims are declared invalid.

3. Business factors

- 3.1 Will the licence give the licensee an exclusive position in the field?
- 3.2 What is the practice in the industry with regard to patent licensing? Are patents respected? What are historic royalty rates in the relevant industrial sector?
- 3.3 Will the licence enable a licensee to enter a new field?
- 3.4 Does the invention have only one or many potential commercial applications?
- 3.5 Will the licence have geographical limitations?
- 3.6 Will the licence permit the licensee to compete in a field from which they are presently excluded because of the patent rights of others?
- 3.7 Will future related inventions be offered as improvements or on an option basis?
- 3.8 Does the invention fit in well with the licensee's existing operations and activities or would it have to make major structural changes?

4. Technological factors

- 4.1 As technology becomes older, its value decreases. Thus the exercise of an option on a fully paid-up basis may be the most logical thing to do at one point in time but further expansion at a future date may be agreed on the basis of a reduced royalty rate, given the relative age of the technology. Different technologies age at different rates, for example catalysts are developed more rapidly than pharmaceutical compounds.
- 4.2 Licences covering the construction of large plant do not need minimum payments. Why? The licensee must invest much more in the plant than in the licence fee so economic pressure alone will encourage production. If economics do not provide sufficient incentive then it is most unlikely that a minimum payment requirement will improve performance.

- 4.3 Grant backs for use by competitors (via the licensor) are a negative limit on the value of the licence to the early licensees. These must be on a non-exclusive basis otherwise they will be judged as being restrictive of competition and against public policy. Competition law is relevant in the EU and comparable anti-trust law in the USA.
- 4.4 A process at the pilot plant stage offers high risk, hence its low value in licensing terms. A process from a proven operating plant offers low risk and hence high value. This is often the case even if there is no patent position but there is significant, proven know-how.
- 4.5 Strong patents, a significant lead-time, a good trade mark, something unique such as a catalyst or lower consumption of the necessary, costly raw materials or production savings all lead to cumulative values. The more available are these factors then the higher the royalty rate that can be demanded.
- 4.6 One piece of a process is less valuable than an entire process. Licensee may have to pay two or more parties to put together a total production package.
- 4.7 Is future technology likely to come from another scientific discipline, e.g. genetic engineering v natural products?
- 4.8 Products via process licences: can the process used be identified in the final product? If not, how can infringement of a process patent be policed?

Investment theory for royalty calculations

The main financial feature of a licence is the arising income which is paid to the licensor either as a lump sum or at regular intervals or a combination of the two. The economic case to justify the investment by the licensor in order to achieve the due payments from the licensee has to be established and in a similar manner the licensee will have to make out a case to acquire the licence. The accurate measurement of the return on an investment is obviously of great interest to an investor and the methods to achieve this vary both in terms of their utility and their ultimate value. For example the payback period method calculates the time needed for the expenditure on a project to be fully recovered; unfortunately it ignores the profitability of the investment. To overcome this deficiency the book rate of return principle can be used to calculate the profit made as a proportion of the original investment. Both these approaches completely fail to account for the time value of money and do not allow for situations where more than one investment is to be made. As will be shown later in this chapter methods used

widely in the venture capital industry are of particular value in assessing licence deals. Before reviewing these methods the anecdotal evidence of licensing experience in determining value should be considered, even if the conclusion is that it does not provide the basis for a sustainable model for future application.

Financial models

A number of financial models have been developed which assess, in a rather arbitrary way, the economic benefit or value of a licence which gives access to a particular piece of intellectual property. All of them essentially attempt to provide a plausible justification of the price demanded by the licensor. Typical of this approach is a model that boldly suggests that royalty payments should be equal to 25% of the gross pre-tax profit generated by the licensed product or process. The major drawback of this guideline is the definition of gross profit. It is usual to strike gross profit on the basis of direct production costs including depreciation but excluding all overhead, administrative and selling costs. The degree of marketing and sales support required for specific products may well vary significantly as a function of the degree of sophistication of the product and hence require a better trained (and better remunerated) sales force. A further problem with this rather crude approach is the absence of any direct linkage between the capital investment required by the licensee to put the licence into effect and the percentage of gross profit to be paid subsequently as royalty.

Another method is to consider what is normal or historically typical for a specific industrial sector. This approach is controlled by what others have been doing globally in the past rather than by any consideration of the current efficiency, profitability and economic performance of an individual company. It relies completely upon others having correctly assessed and analysed the various factors affecting the income generated by the licensed product or process. There is a lack of recognition of the changing value of investments and of the possible alternative investment opportunities open to the licensee other than by acquiring a licence.

Approaches based on what might have to be spent in the future or has been spent in the past in carrying out the necessary research and development and eventually converting the results into a potentially marketable product should be treated with caution. It is rare for the total cost to be equal to final value since, by definition, such activities are risky and there is no guarantee of a successful outcome. Indeed the prudent accounting of research and development expenditure normally writes it off in the year during which it is incurred rather than capitalising it in the expectation that it will have any future value. UK taxpayers and those of other countries will be well aware of costly write-offs in defence and energy projects funded by central government where the objectives fail to be attained and the residual value is effectively zero. Another way of valuing IPR assets is to look at the residual element in an asset valuation of a company after deducting the value of the sum of all other assets listed in the balance sheet. Factors such as the level of economic activity, projected inflation rates, the likely future cost of money, investment policy targets of the company etc., have to be considered and their relative impact assessed. In addition the effects of technological obsolescence, product life cycle etc., have to be taken into account. In essence, the calculation involves the attribution of specific rates of return for different classes of asset, e.g. cash and fixed assets of varying degrees of liquidity will have different rates of return. The analysis of the balance sheets of companies with so called strong brands usually attributes a high proportion of the net asset value to intangible assets. This is also the case of companies with strong technical advantages typified by the pharmaceutical and software sectors.

Royalty payments should give a fair financial return on the commercial exploitation of an intellectual property asset. They are based essentially on what is perceived to be the level of future economic benefits which will arise from use of the asset by an enterprise. Historic costs are clearly relevant but are not a dominant factor in this analysis and, according to some schools of thought, should be ignored as they have zero value. Investment theory can provide the basis for a sensible and logical approach to the valuation of intellectual property assets and to the determination of royalty rates and other payment terms, which are an essential part of a licensing agreement. Royalty rate calculations should be made using sound, clear, basic principles. Parr and Smith (USA) have listed four areas of concern:

- 1. Obtaining a fair rate of return on the intellectual property rights;
- 2. Value relates to future income generated by use of an asset;
- **3**. The price level for sale of the licence requires a profit element based at least on the profit obtainable from investing in a financial instrument such as a government bond;
- 4. Obtaining a fair rate of return on any capital investment in the necessary equipment needed to exploit the intellectual property asset acquired via a licence.

In responding to these concerns three different valuation methods for assessing the fair market value of property can be identified:

- 1. Cost incurred
- 2. Market comparisons
- 3. Income generated.

Cost incurred

The first of these considers what cost would be incurred in order to produce a similar asset of equivalent utility, either on a historic basis using the actual expenditure or on an estimated replacement basis using current costs. This is useful for intellectual property valuation only in very limited circumstances since it takes no account of future income generated by the property and furthermore presumes that the effort will be successful. The latter is a dangerous presumption if the history of risk and research outcome is ignored.

Market comparisons

In contrast the market comparison approach considers transactions which have traded similar property of identical utility and compares the value obtained, i.e. the transaction price. An alternative version uses comparable or equivalent royalty rates obtained in the market. This is useful for standard, widely used and recognised property and only then if market knowledge is nearly perfect and freely available to all participants. In the UK this is typically found in the housing market. There is a high volume of unit sales, the product is fully described, its function is well understood and, above all else, accurate information on the price level of comparable recent sales is available to, and known by, both vendor and purchaser. Some venture capital transactions rely on this approach when deciding on price levels required when further rounds of funding in a growing company are needed. This method is also used for share transactions when companies with similar assets operating in similar markets can be compared on the basis of their price/earnings ratio.

Income generated

The future income generated by a licence is based on a calculation of the net present value of income, which is forecast to arise from commercial use of the property by a licensee. Since the future is essentially unknown, the issues of risk assessment and uncertainty of outcome have to be examined carefully. In order to calculate present value, a discount rate has to be applied to the income which best reflects the subjective estimate of an uncertainty element. The simple question is by how much should future income be reduced in order to estimate its worth today? A discount rate of 15% means that a unit of income forecast to arise in one year's time is reduced to only 85% of its value in present day terms. A bird in the hand is definitely worth two in the bush where money is concerned. The calculation covering a number of years of estimated future income is simple, provided that the discount principle is recognised. The total of the annual amounts to be received is divided by a discount factor to give its current value. In simple

arithmetic terms the discount factor is $(1+i)^n$ where *n* is the number of years in the discount period and *i* is the discount rate, expressed as a decimal number less than unity e.g. 10% is written as 0.1. A prudent approach suggests that an income lifetime of ten years be assumed, made up of an initial five years of growth and a final five years of decline, since in reality it is impossible to predict accurately the value of a commercial outcome more than five years hence. This discount process is the opposite of compounding where interest obtained for the investment of a capital sum today is added to the capital sum at the end of each year and the new total amount of capital and interest is then reinvested. The selection of an appropriate or realistic discount rate is the critical feature at the heart of this problem and ideally a rate should be chosen which is equal to that available for investment in alternative projects of equivalent risk. This is not an easy issue to resolve objectively. The combination of estimates of likely future cash flow and the selection of a subjective discount rate produces a considerable degree of uncertainty in these calculations for periods exceeding five years. Hence the above assumption that the market will decline after an initial five year period. Even so this is still the best way forward in assessing the economic prospects of an investment.

Net cash flow

The main question to be answered in considerations of value is 'what net cash flow arises from the transaction'? This is a figure obtained by subtracting the necessary investment expenditure from the arising revenue, and then calculating its net present value using the appropriate discount rate. From this data it is possible to evaluate an internal rate of return (IRR) for the project, which takes account of the time value of money and enables it to be compared with the returns of different groups of investments. The return is quoted as a simple percentage. The concept of an internal rate of return is widely used when comparing risky projects seeking investment from venture capitalists and is well suited to analysing the economic potential of licensing projects. Its definition demands some care as it is not a return on investment as commonly understood. The IRR is that rate which discounts the present value of the cash outflows of an investment so as to equal the sum of the present value of the future cash inflows. This is usually calculated by a trial and error method, although this is made easier by spreadsheet software. Another way of looking at this concept is to regard it as the maximum rate of interest chargeable on a bank overdraft amount equal to the cash outflow of the investment. As the inflows arise they effectively reduce the overdraft until it reaches zero; at this point the project breaks even. All further inflows after this point will give a positive and profitable return for the project. The investment policy of a company will then determine whether this internal rate of return is acceptable when compared with the external rate of return, typically represented by the interest paid on a government bond or by the money market on a fixed term deposit. The higher the level of the required investment and the greater the perceived risk, the higher the internal rate of return will have to be to justify a positive investment decision. It is not unusual for the internal rate to be a multiple of at least three to four times the external rate; indeed venture capital investments are typically made on the basis of potential internal rates of return in the range of 35% to 45%.

These financial techniques of discounted cash flows are of great value in assessing licensing projects as they take account of the time value of money but they require analysis of accurate information and hence impose a necessary discipline on the project management team. They are recommended to any organisation contemplating an entry into the licensing business.

An analysis of the costs involved in creating and maintaining patents and the revenue derived from licensing over a wide range of patented products has been made by Tanner (formerly of BTG). He has developed an empirical relationship which suggests that the revenue generated by a successful licence exceeds sunk costs by a factor of five to ten and for the most successful pharmaceutical product the factor is 1,000. This shows the potential of a sound licence based on strong patents operating in growing markets.

Typical royalty rates

Licence income is made up of option fees, issue fees, maintenance fees and royalty fees. One problem with the licensing business is the lack of an authoritative source of the financial terms associated with a large number of agreements covering a variety of industrial and commercial sectors worldwide. An effort to overcome this deficiency has been made by a US consultancy group and *'Licensing Economics Review'* started to publish some data on a regular basis in 1991. A range of typical royalty rates, based on a percentage of net selling prices, can be found in the financial terms for patent licensing agreements. Examples of these rates are as follows:

- 0.5 to 4% for consumer products with a low unit selling price but where they are sold in high volumes (typically in excess of 1 million units per annum). A recent example quotes the payment of 4 US cents per item for the new DVD format used to store TV and film images; annual sales will soon exceed 100 million units.
- 4 to 10% for specialist consumer products or general industrial products where prices are higher but volumes are lower. As an illustration a

pipeline rehabilitation licence has royalty terms of 6% of the value of the contract.

- 10 to 15% for specialist industrial products where annual unit sales are of the order of thousands.
- Advanced medical products based on gene therapy are currently attracting royalty rates of 15%, with some novel therapeutics receiving 20% upon formal approval being granted.

Character licensing gives a valuable revenue stream to television companies producing children's programmes with reported royalty rates for a wide range of related merchandise in the range of 6 to 10%. Clothing associated with US academic institutions is sold with royalty rates from 6 to 7.5% and the licensing income reportedly exceeds that generated from exploiting patents.

Another source of published information on royalty terms is that recorded by the courts of law, which have to settle the level of damages to be awarded in infringement cases and to be paid to a plaintiff by a defendant if the case is proven. A spectacular illustration of the value of this source is to be found in a recent UK case, which dealt with the unauthorised copying of cartographic information. The judge assessed a total sum of £20 million to be paid by the defendant. This was made up of a licence issue fee, royalties for past and current sales and royalty rates were also fixed for future sales. Licences of right also lead to official declarations on the appropriate royalty terms to be awarded to the reluctant licensor. They are of interest because the reasoning behind the settlement terms is usually explained in full by the judge on his decision statement.

The taxation of intellectual property income

It has been said by more than one social commentator that there are three certainties in life:

- **1**. Birth
- 2. Death
- 3. With all actions in the intervening period being taxed.

The licensing of intellectual property rights is no exception to this rule and all involved must familiarise themselves with the relevant applicable tax regimes and their liabilities both to deduct specific taxes from payments on behalf of the local tax authority and to pay them directly as necessary. As tax rates vary from country to country some thought has to be given as to where the parties are based so that if possible the amount of tax can be reduced. A decision to use these so called 'tax havens' needs prior expert advice. There are two guiding principles to be noted. One concerns tax avoidance which is legal, and tax evasion which is not. In the UK the attitude to tax avoidance schemes is admirably expressed by the 1936 decision that 'every man is entitled if he can to order his affairs so as that the tax attaching under the appropriate acts is less than it otherwise would be. If he succeeds...he cannot be compelled to pay an increased tax'. The second deals with international treaties between nation states, known as double taxation treaties, which are designed to avoid the imposition of tax by any two countries on the same payment. For payments due to an entity in another country the transaction is taxed locally and the recipient is given a tax credit to offset against their local tax liability. It is worth noting that in many of these cases royalties payable under licensing agreements are exempt from deduction of tax at source.

There are five relevant taxes for licensing matters:

- 1. Income tax;
- 2. Capital gains tax;
- **3**. Corporation tax;
- 4. Value added (or sales) tax (VAT);
- 5. Stamp duty.

The territorial origin of the income and the country of residence of the recipient are the major factors to be taken into account when assessing liability to tax. A simple clause in an agreement which expresses the parties' mutual intent to cooperate so as to take advantage of double tax provisions will usually suffice. Another point for tax purposes is the difference between know-how and showhow. Know-how is usually taxed on the same basis as a patent but the provision of show-how is basically a service and in fact may be tax deductible from revenue and treated as a business expense. The cost of obtaining patent protection and keeping it alive is deductible from any arising revenue for tax purposes. In the European Union VAT or sales tax is usually levied by a licensor on all income derived from a licence, which is regarded as the provision of services, and must be accounted for on a regular basis to the tax authorities. It is thus advisable to make clear by way of a sub-clause in the licence agreement that all invoices for payments due will show the amount of VAT payable on the sum (the rates vary from country to country). If the income arises in another country it is still taxable but the VAT rate is zero. Given the complexities of the different forms of intellectual property and the various operative tax regimes the managers of the commercial exploitation of all types of licensing agreement should take advantage of expert fiscal advice in planning the finances of the business before signing any contract.

Regulatory framework

INTELLECTUAL PROPERTY MONOPOLIES AND FREE TRADE COMPETITION AND ANTI-TRUST LAWS INTERNATIONAL REGULATIONS THE FREE MOVEMENT OF GOODS/EXHAUSTION OF RIGHTS



Chapter 5: Regulatory framework

Intellectual property monopolies and free trade

The very nature of intellectual property rights confers a privileged position on their owners insofar as they provide a potential monopolistic advantage that can be exploited commercially. The monopoly is granted by the state because it is felt that on balance society economically benefits from inventive and creative acts; the fact that individuals might personally benefit is put on one side. States in contrast prefer (at least they claim so to prefer, even when the state controls certain monopolies) open and fair competition in a free market economy. From this clash laws arose which sought to control actions likely to restrict competition and thus disadvantage the consumer. It is within this legal framework that the licensing of intellectual property rights has to function and hence all parties involved must be fully aware of what is allowed and forbidden and how these limitations are expressed in the agreement. There are two areas of concern: one is with arrangements between parties likely to restrict competition within defined territories; the other is with the abuse of a dominant position (this could be exemplified by a dominant company acquiring an exclusive licence and further reinforcing its dominance).

Competition and anti-trust laws

These concerns give rise to competition laws in Europe and anti-trust law in the USA and to the establishment of the relevant government departments such as the Office of Fair Trading (UK), the Department of Justice (USA) and the European Commission (EU). Licensing agreements thus come under the ambit of these laws with the focus of their attention tending to be on patent licences rather more than on other forms of licensable property right. Since the UK is a member of the European Union the general provisions of any relevant Directive as enacted in English law will apply to licensing agreements. The UK Competition Act 1998 introduced a long-awaited reform of the law with its basis to be found in two articles of the Treaty of Rome. These are Article 81 (formerly 85), which deals with agreements likely to affect trade and made so as to prevent, restrict or distort competition and Article 82 (formerly 86), which prohibits the abuse of a dominant

position if this affects trade. The commercial exploitation of intellectual property rights by licensing must take account of these provisions of European law. In particular all involved should be fully aware of Article 81(3) which allows certain types of agreement to be exempt, even though they are anti-competitive, as on balance they could bring advantages to the public. In practice this means that many licensing agreements can benefit from this exemption provided that they satisfy specific regulations. The relevant document is entitled *'The European Technology Transfer Block Exemption Regulation'* and its reference number EC No. 240/96 should be familiar to all concerned with licensing as it defines very clearly what is allowed and what is forbidden in licensing agreements if the parties want them to benefit from block exemption. Readers are referred to the published text for full details. Three areas, dealing with restrictions which are exempted, restrictions which are permitted and provisions which are not exempt, are listed in Annexe 2.

Some important features should be noted. Both patents and know-how are now covered by the same regulation. For exclusivity and territorial protection clauses the start of the permitted exemption periods of either five years (for pure patent licences) or ten years (for know-how licences) now runs from the date on which the licensee first puts the licensed product on the market, rather than from the date when the licensor first puts the product on the market. A market share test has been introduced and exemption may be withdrawn if the licensee's market share exceeds 40%. Passive sales by a licensee, with passive sales defined as those which result from an unsolicited approach from an organisation outside the accorded territory, can be banned for a maximum of only five years as from the date of first sale by the licensee. The regulations can be divided into two sections: permitted clauses covering actions which are not restrictive of competition comprise a 'white list' and forbidden clauses which are absolutely restrictive and anti-competitive make up the 'black list'. All concerned with licensing within the European Union should familiarise themselves with these regulations. Within the European Union there are so-called vertical restraints 'Block exemption' regulations (2790 99), which apply to exclusive distribution, purchasing and franchising agreements. These came into effect on 1 June 2000. Official EU Guidelines (2000/C29/1/01), which are designed to allow companies to make their own assessment of their own agreements in the light of these regulations, have been published. The relevant intellectual property rights are copyright, trade marks and know-how but it should be noted that the IPR provisions must be ancillary to the agreement's main objective, which is focused on distribution. Pure trade mark licences and sub-contracting involving know-how are outside the scope of this regulation as are vertical agreements dealing with so called 'technology transfer' arrangements. The latter are covered by technology transfer regulation number: EC 240/96 referred to above.

One positive consequence of these changes for UK companies is the ending of the obligation imposed by the Restrictive Trade Practices Act 1976 to notify agreements if they are exempt from Article 81(1) by falling within the block exemption regulation.

International regulations

Any company operating in the USA must take full account of federal anti-trust law as it impacts on all forms of intellectual property licensing. The Department of Justice and the Federal Trade Commission issued anti-trust guidelines for the licensing of intellectual property on 6 April 1995, so that it is possible for all parties to be able to predict whether or not the relevant agency 'will challenge a practice as anti-competitive'. The combination of intellectual property laws and anti-trust laws are supposed to promote 'innovation and consumer welfare'. These guidelines are contained in six clauses with specific examples to illustrate their application in practice. In contrast to the EU approach there is the basic presumption that intellectual property rights do not necessarily give rise to market power and licensing of these rights is generally pro-competitive. One interesting feature of the guidelines is the definition of a 'safety zone' for anti-trust purposes so that a degree of certainty is provided to those contemplating a licensing arrangement. Part of this 'zone' concept specifies a market share limit of 20% for both parties below which there will be no challenge by the agencies to a proposed licence. Among the issues covered by the guidelines on a 'per se' basis and judged to be of an anti-trust nature are price fixing and resale price maintenance, allocation of customers and output reduction agreements. The 'rule of reason' approach is applied to a number of relevant issues including vertical relationships, exclusivity both of the licence itself and of dealing arrangements which lead to restraints on the licensee from using competitive technologies, tying arrangements for the supply of non-patented items from the licensor, cross-licensing and patent pooling, and improvement grant backs. The need for informed advice on US licensing agreements for non-US companies is evident if problems are to be avoided or preferably anticipated.

The free movement of goods/exhaustion of rights

All supporters of open markets regard the free movement of goods favourably but there has been a certain reluctance on the part of intellectual property owners to allow that same freedom for goods made or traded under licence deals. Nevertheless the doctrine of 'the exhaustion of rights' under which a 'protected' product can be freely traded by all third parties once it has been placed on the market with the permission of the rights' owner, is now widely accepted. The intellectual property rights are 'exhausted' at the moment of the relevant product first being placed on the market and the owner has no further rights to control their movement. This means for example that in the EU free movement is preserved for goods first released within the EU, but goods legally licensed outside the EU can be prevented from entry to the EU.

One further regulatory restraint exists with respect to the granting of licences for goods with a potential military application. When national security is held to be relevant then the proposed licence can be deemed illegal and the offer must be withdrawn. This is particularly the case in the USA where the export of specific hardware items and related licences can be forbidden. The UK has a specific restraint known as 'Crown Use' whereby the state reserves to itself the right to carry out acts which, if made by other individuals or organisations, would be an infringement of the intellectual property rights of the owner. Two areas tend to be the focus of 'Crown Use': national defence and products related generally to human health. There is usually compensation by way of a royalty payment, the level of which is settled on a reasonable basis by an independent body.

The final limitation to be considered is that of the compulsory licensing of a right. This is based on the requirement that intellectual property, such as patents, designs and trade marks, must be used. In the UK for example, the failure to use a patent can also be accompanied by market demand not being met on reasonable terms or being satisfied only by imports as grounds for a compulsory licence being granted. The terms of this licence including the appropriate royalty will be set by a court of law and subsequently published. It is interesting to note that these compulsory licences provide one of the few independent sources as to what is a suitable royalty for any given category of product within defined industries. The fact that the methods used rely on costs plus an element of 'uplift' or on a share of the 'profits available' in order to calculate royalty rates contrasts with the more logical, economic method of future income outlined earlier in this Report.
Structure and terms of licensing agreements

CONFIDENTIALITY OF DOCUMENTS DEFINITIONS SPECIFIC CLAUSES RELATIVE INTERESTS OF PARTIES TO LICENSING AGREEMENTS ESSENTIAL CLAUSES OF A LICENCE AGREEMENT



Chapter 6: Structure and terms of licensing agreements

Confidentiality of documents

Confidentiality issues are relevant to various stages of a lengthy process, which starts with a first contact expressing possible interest in an eventual licence, leads to a signed agreement and concludes with its termination. The relative importance of confidentiality will vary from stage to stage but it is always sensible to govern the exchange of information by means of an agreement binding on all parties within which the nature of the confidential matters is specified, clearly identified and understood. The economic status of either party may be a determining factor in deciding whether or not to reveal the fact that a quoted company is interested in licensing a particular item; there are many recorded examples of the share price of a company moving sharply when this interest is announced in the press. Initial contacts should focus on the provision of sufficient information to enable a decision to be made as to the next step to be taken. Iain Baillie has commented that any information should concentrate on results rather than on the means by which the results were obtained, this being particularly important where secret know-how rather than a patent is concerned. Even if an agreement is signed the advice must be to keep to the absolute minimum any unprotected information being offered to the other party. Once the decision has been taken to proceed to detailed assessment and full evaluation of the opportunity then formal agreements are essential so that confidential matters can be discussed. This occurs within a framework which describes their content and spells out what obligations are to be imposed on all concerned, as well as any exemptions covering matter in the public domain or material already known to the recipient before it was offered by the licensor. It is generally advisable to disclose sensitive material only on a 'need to know basis' and then only to specific individuals nominated by the recipient.

There is a real problem of maintenance of confidentiality if a potential licensor simultaneously contacts a number of potential licensees; indeed it may appear to be a contradiction in terms to describe something as being secret and yet disclose it to many parties. It is verging on the impracticable to control such material when each party may be speaking with others on related issues. Faced with this reality the rule must be 'keep it to a minimum' and ensure that all confidential documents, including all copies made by any means, are returned if agreement is not possible. Once the licence is signed then confidentiality assumes a number of different roles. Secret material will have to be transferred or revealed so that a licence can be operated but a question remains: how can its use only in relation to the licensed subject be ensured and controlled? At the very least there should be clarity on this problem as expressed by a specific clause in the body of the agreement. There should also be clarity as to what is considered confidential. This must be achieved by specifying and labelling each and every document, which is to be regarded as falling within the domain of secrecy and confidentiality, before being transferred. The fate of this information upon termination of the agreement must be expressed in the contract document, dealing with its use, its disclosure to others and the return of documents to the licensor upon termination. The need for common sense on these matters is obvious as it is difficult to control information when employees are mobile and many years may have elapsed since the licence was agreed.

Definitions

It is usual to define terms and phrases that will subsequently appear within the body of the agreement at the start of the document and name this clause as appropriate. The level of detail to be provided for each definition must ensure that there can be no possible doubt as to its precise meaning. This desire for precision has to be offset by an equal need to keep the document to a reasonable length and in the end the individual style of each author will decide this matter. It is important that having defined a term its subsequent appearance in various clauses must not contradict the definition given or render it ambiguous. The 'definitions' clause is typically used to give meaning to terms such as: patent rights; licensee; parent and affiliated company; sub-licensee; contractor and sub-contractor; use; sale; licensed product or process; territorial limit; time periods and dates of action; royalty basis. As a general rule it is worth reviewing each clause when the document has been fully drafted and incorporating into a 'definitions' clause any term or set of words that appears in two or more clauses. At the very least it will prevent duplication of terms and ensure consistency.

Specific clauses

An agreement will consist of a number of clauses which give formal expression to the desire of the licensor to give their binding consent to specific actions of the licensee as defined by the licensor, which would be illegal if consent were not given. The contract is completed if the offer made is accepted and a consideration is provided. The agreement can be divided into three major sections:

- 1. What is the right or rights being licensed?
- 2. What is required of both parties?
- **3**. How is each party relieved of their respective obligations and the agreement terminated?

In the first section the product or process is defined along with the specific intellectual property being licensed. The breadth of the licence is then described in terms of permitted use and purpose. It is usual to specify research, manufacture and distribution or any combination of these three activities. The agreement then moves on to the grant of rights under the licence. These cover territorial limits, competition and the degree of exclusivity being offered. The central issue of the respective obligations of licensor and licensee are then dealt with at length. The licensor undertakes: to provide warranties and indemnities regarding the intellectual property items; to disclose necessary know-how and show-how; to provide appropriate technical assistance and training after signature; and to transfer information on relevant improvements. The licensee's duties essentially comprise: the payment and form of royalties due on the relevant products which are to be registered in written records; the maintenance of confidentiality; commercial performance and the need to meet quality requirements. The term of the licence and of the rights are defined along with the reasons for termination and how they are to be enacted. All of these points are to be incorporated into the draft document which will be refined and altered as the parties negotiate their way to an agreement. Illustrations of a variety of licences are shown in chapter 10.

Relative interests of parties to licensing agreements

Three sets of rights can be defined within the context of licensing agreements: those of the licensor, those of the licensee and those common to both parties. A brief comment on each set is merited.

The licensor

What does the licensor have which is of interest to the licensee? The following list is indicative of these rights rather than being comprehensive in detail:

- Intellectual property assets either as patents, trade marks or know-how.
- An operating plant which is efficient and which can be readily duplicated.
- A sufficient technology budget and appropriate development projects.
- A good reputation for technical success and a well-managed licensing programme.
- Trained and skilled people, both engineering design staff and support personnel, to help the licensee both now and in the future.
- A proven product or process (both in production terms and in sales volume).
- Equipment specification and procurement capability.
- Up-to-date, accurate market information covering both existing and new markets.

Some specific points to be considered by the licensor include the following:

- An awareness of what is involved in carrying out a due diligence exercise, how it is demonstrated and then ensuring that it is carried out. A significant question of interest is how new markets will be tackled by the potential licensee.
- The problems associated with payments due from the licensee e.g. its form is it to be as cash or as product/stock (barter agents may be needed); what currency denomination is to be specified preferably internationally recognised e.g. dollars, sterling and euros, with effect from 1 January 2002 for the European Union; ability of licensee to remit payments local exchange controls may be in force; timing of receipts lump sum or periodic royalties; fiscal deductions are they to be made at source by the licensee or by the licensor upon receipt; calculation basis independent verification of sales made under the licence by regular audit; penalty charges for being in default.
- Ensuring that product quality under the licence is defined and maintained and checking that any advertising claims made by the licensee are in keeping with the licensor's established standards.

The licensee

These are best considered as responses to the question: what does the licensee have which is of interest to the licensor?

- Finance and a sound financial reputation.
- A production unit and/or sales organisation in a field or territory not covered by the licensor.
- Experience in achieving technical success using licensed technology.
- Trained and competent employees together with appropriate plant to make the product.
- Commercial knowledge of local market conditions.

Some specific points to be considered by a licensee are:

- Who is to be responsible for any agreed legal action on possible infringement?
- Assessment of the scope and strength of existing patents and being vigilant as to the relevant areas of intellectual property through regular reviews of patent filings.
- Responsibility for procuring and sharing information on new developments: identifying any relevant know-how and trade secrets, some of which may come from other licensees.
- Ensuring that 'most favoured nation' status is available to all licensees.
- The need to seek out expert legal advice on compliance with competition law (EEC) and anti-trust requirements (USA) as they apply to licensing agreements. This is needed in order to avoid serious financial penalties, which are based on turnover rather than profit, and the possible striking out of an agreement if it is found to be illegal.

Mutual interests

The joint interests of licensor and licensee can be expressed as mutual rights and include the following points:

- Maintenance of intellectual property strength on all fronts, paying particular attention to geographical coverage of those markets where the licence is to be operated.
- Consideration of the specific features of US patent law: interference proceedings and prior publication are particularly relevant to licensing by foreign companies.

- Marketing issues associated with the use of trade marks and related advertising claims.
- Effects of changes in ownership of either licensee or licensor.
- Maintenance of sound financial health. Bankruptcy and liquidation/ winding-up actions are to be avoided, as they can be grounds for termination of a licence.
- Looking out for major changes in markets as a result of economic or technical factors.

One other area that must be kept under review concerns the rights of third party inventors, such as academic institutions and government agencies, who may be an indirect source of a licence. This is particularly relevant when the technology has been developed with taxpayers' money, distributed via state-funding mechanisms, and there may be obligations to make compensatory payments out of the proceeds of successful licences. Provision must be made for appropriate action in the event of a failure to exploit third party inventions that have been assigned for licensing by others. Such action can include recovery of the assets or the conversion of an exclusive agreement into a non-exclusive one.

There is an absolute need for the maintenance of financial records and records of progress as well as the submission of regular reports by each party on such matters as improvements.

Essential clauses of a licence agreement

This list below is a summary, and is not necessarily exhaustive, of the major points to be covered in the clauses of a typical agreement. Its use will provide both parties with a basic template against which draft documents can be checked before entering into detailed negotiations to finalise the deal. Differences between the legal systems and the custom and practices of English-speaking countries and those of continental Europe should be understood and acknowledged if fruitless discussions based on mutual misconceptions are to be avoided. The common law system typified by the UK and USA allows reported cases to set out the law and to interpret the statutes in question. The civil law system is codified in great detail and the articles of the code provide the basis against which all actions are judged. Documents from the USA and the UK typically tend to contain very precise phrases and to be quite specific. They are thus lengthy and discursive, whereas France, Germany and other civil law countries produce agreements which are positively brief in comparison, as they tend to express the general intentions of the parties. Specific examples of complete documents to illustrate various types of licensing contracts are provided in chapter 10.

- 1. Warranty of title by licensor for licensed patents and/or know-how.
- 2. Specific identification and enumeration of all intellectual property rights (patents, designs, trade marks and copyright) to be licensed, including any granted foreign rights corresponding to domestic rights already granted. Full details can be listed in an annexed document. All pertinent know-how is usually presented in a separate confidential publication to be supplied immediately upon signature of the licence. Great care is called for in ensuring that this valuable information is not inadvertently disclosed during negotiations.
- 3. Type of licence to be granted: exclusive, sole or non-exclusive.
- 4. Limitations upon the rights granted:
 - a) Territorial restrictions.
 - b) Field of use restrictions.
 - c) Specification of the right to make or have made and/or use and/or sell.
- 5. Rights to be granted back non-exclusively to the licensor by the licensee.
- 6. Technical assistance to be provided by licensor:
 - a) Initial transfer of licence know-how.
 - b) At the outset to put the licence into effect.
 - c) Technical assistance on specific arising problems.
- 7. Payment for rights granted:
 - a) Issue fees, payable upon signature as a lump sum.
 - b) Percentage of sales price to be paid as royalty with a specific definition of what shall be the net sales price and what product is subject to royalty.
 - c) Guaranteed minimum royalty payments (to encourage diligence by the licensee).
- 8. Royalty arrangements:
 - a) Based on a licence for a single site or production facility or on a licence for all of licensee's operations (multi-site).
 - b) Fully 'paid-up' licence (one off payment) or 'running' royalty (regular payments) basis.
 - c) Ability of licensee to credit previously paid 'running' royalties towards fully-paid licence.
 - d) Minimum royalty provision (to ensure efforts by licensee to make sales).

- e) Licence terminable by licensor if minimum not made.
- f) Credit for paid minimum amounts against future 'running' royalties.
- g) Conversion of an exclusive licence to a non-exclusive basis if sales leading to minimum royalty amounts are not made within a defined time period.
- 9. Adjustment of royalty rate to a different level if licensee is required to pay under prior, dominating patents.
- **10**. Reporting obligations:
 - a) Length of reporting period quarterly or annually.
 - b) Payment of royalties to accompany reports and related invoices.
 - c) Keeping of sales records and right of licensor to inspect the same.
- **11**. Term of licence agreement:
 - a) Life of patent rights.
 - b) Fixed term.
 - c) Right of renewal or extension of term.
- **12**. 'Most favoured nations' provision in non-exclusive licence agreements.
- **13**. Marking of any articles, subject to the licence, made, sold or distributed by licensee to be in accordance with the relevant patent and trade mark laws.
- 14. Litigation provisions:
 - Extent of patent indemnification including obligation to identify and notify infringement and to defend infringement suits; specification of party liable to pay for litigation action and to participate in any resulting awards.
 - b) Suspension of obligation to pay royalties or escrow provision for royalties due if infringement suit is brought against licensee.
 - c) Disclaimer by licensor of any patent indemnification.
 - d) Arbitration if licensor and licensee fail to agree differences between them.
 - e) Termination of royalty obligation upon patent or any of the claims of a patent being declared invalid;

- **15**. Termination provisions:
 - a) Right of termination by one party on default of the other party; notification and rectification procedures to be specified.
 - b) Right of licensor to terminate if minimum royalties are not made.
 - c) Right of licensee to terminate after a fixed period of time.
 - d) Right of either party to terminate upon the insolvency or bankruptcy of the other party.
- **16**. Confidentiality obligations to be defined with respect to any technical information exchanged under the agreement and its eventual destination upon termination.
- 17. Residual rights upon termination:
 - a) Licensee continues to be licensed (on the basis of royalties paid prior to termination) with respect to goods made prior to termination but not yet sold.
 - b) Confidentiality obligation with respect to all technical information and specific identified confidential information to survive such termination.
 - c) Royalty obligation of licensee to apply on amounts accrued before termination but not yet paid.
- **18**. Assignment rights of both parties to successors in business or to affiliates to be defined. This provision covers sale, acquisition or merger.

The exact content of each clause will depend on the style of each draughtsman but it is recommended that a qualified lawyer should check any final draft, which has been prepared by an unqualified person, for any possible errors or omissions and ensure that the language of the document is unambiguous.

Negotiation of licensing agreements

A METHODOLOGY FOR CONDUCTING LICENSING AGREEMENTS NEGOTIATION STRATEGIES NEGOTIATION TACTICS HOW TO FAIL WITHOUT REALLY TRYING CHECKLIST FOR PREPARING A LICENCE NEGOTIATION



Chapter 7: Negotiation of licensing agreements

Negotiation of a licence involves a willing process of exchange with another party, relative to 'values' that are not fixed, so as to arrive at a mutually acceptable settlement. Where all values are fixed and are thus non-negotiable there is no need for a licensing person; all that is needed is a signature on the contract. To reach agreement, negotiation of contentious issues will be necessary and this is not a skill possessed by all who might be involved in the various subjects of a licence.

The best licence negotiator is the one who:

- Knows the product or process technology and the associated economics;
- Is knowledgeable on the dynamics of the markets being served;
- Is comfortable with the negotiation process;
- Is thoughtful and a good listener and has learned to control their impatience.

The mere specification of these qualities does not significantly alter the capabilities of a negotiator because 'rules of thumb' or guidelines are of only limited value in trying to reach an agreement. Efforts have to be made to treat negotiation as being a managed and systematic process. The purpose of the methodology that follows is to reduce to system and method an art too often practised by intuition and hunch; to substitute logic and order for chance. No claim is made that this is a novel idea but the fact that so much negotiation takes place in an apparently disorganised way encourages me to recommend this approach.

A methodology for conducting licensing agreements

A typical licence negotiation can be broken down into the following four steps:

- 1. Purpose and objective
- 2. Plan and forecast
- 3. Exchange and test
- 4. Agreement.

Each of these steps as perceived by the licensor will now be briefly described and analysed so that an overall strategy can be devised to improve the chances of ensuring a successful outcome to the negotiation of a licence deal.

Purpose and objective

- 1. The primary purpose is to reach agreement upon mutually acceptable terms without forgetting that an enduring business relationship is being established through the licence. Therefore, do not overreach; there is no benefit in going beyond a critical gain point and it may well compromise the long-term.
- 2. The licensing team has to be created and it must start by identifying the basic characteristics of the licensee's business and the relative licensing objectives of both parties, i.e. what does each want? These should then be recorded point by point.
- **3**. Assign values to the objectives, by identifying those which are essential, those which are important and those which are not so important. These should then be assigned relative priorities.
- 4. Identify the most sensitive areas in terms of relative strengths and weaknesses.
- 5. The above process is made less difficult if an economic valuation of the licensed technology has been prepared, together with a market evaluation based on an analysis of all available financial information. The task is further simplified if you have prepared the first draft of the licence, which is sent to your potential licensee for their consideration whilst proposing the first meeting at their offices. It becomes even easier if you know the objectives, needs, authority limits and sensitive points of your future partner. All these points require much thought before even starting a licence negotiation.

Plan and forecast

- 1. Identify the licensees' business and licensing objectives and, as suggested above, apply to these a similar scale of values, which a licensee will think are essential, important and less important.
- 2. Identify those points that seem to be most sensitive in their eyes.
- 3. Match your list with that forecast for the licensee and establish a balance of costs to be incurred versus benefits to be gained.
- 4. Marshal all arguments, the content of the envisaged presentation on the licence and answers to possible questions so as to be prepared to meet the forecast points of debate and any anticipated sensitivities.

Research shows that even the most experienced licence negotiators tend to be weak in the area of planning and forecasting. This weakness is a major reason for the reported poor outcome of many licence negotiations. Hence one must think hard, discuss thoroughly and document each case point by point before making a decision on the viability of any specific licensing deal.

Exchange and test

- A meeting is now necessary so as to engage in a face-to-face negotiation with the licensee. All preparatory documents including the objectives' list of both licensor and licensee should be available for reference whilst ensuring that the other party cannot see them.
- 2. It is always worth giving good news first and bad news later so as to create initial desire and then provide satisfaction of the desire. Attempt to begin 'pro and con' debates on those factors favouring your position.
- **3**. Exchange basic information and thus verify and if necessary correct your forecast of the licensee's objectives, values and sensitivities.
- 4. Test for flexibility what are the limits of the relative positions?
- 5. Use all varieties of tactics, but never forget the overall strategic framework.
- 6. On difficult points, try first for agreement in principle. Only when this is achieved should it be put into writing as some form of 'heads of agreement'.
- 7. Do not be afraid to stop for a review of progress or to discuss in private with your own team an unexpected development.
- **8**. Always prepare a document, distributed in advance, which serves as an agenda for the meeting.

9. Always record in writing all agreed points. Ensure that each side understands and accepts clearly what has been agreed to and, wherever possible, sign off on these points at the end of each session. These 'signed minutes' can often prevent an agreed position being raised again at a subsequent session.

Agreement

A comment is called for on the use of 'heads of agreement' and 'option agreements' as an integral part of the process of reaching agreement on a licence. Great care must be taken during discussions on a possible licensing agreement that an inadvertent oral contract is not entered into. It has become quite common for an exchange of letters to occur in which intentions are expressed. The danger exists that such letters, in which an offer is made, may become agreements by the recipient simply confirming their acceptance. It is advisable to make absolutely clear that a formal written agreement is to follow such a letter. This potential difficulty has led to the practice of both parties expressing their wishes in the form of an initial '**heads of agreement**'. The only difficulty with this approach is that of the 'heads' being simply an agreement to agree; this is hardly worth stating. If nevertheless a 'heads of agreement' is to be used then a minimum number of clauses, which outline the main commercial issues, must appear in the document for it to have any real value and to serve a real purpose. An example of such a 'heads' is shown in Annexe 3.

Negotiation strategies

Another way of buying time in a negotiation is to resort to the offer of an 'option' to a licence. The offer is that of an exclusive period of time during which the licensor undertakes not to offer a licence to any other party, other than the named licensee. The named licensee is to use this period to assess the opportunity with a view to making a decision either accepting or declining the agreement, which is appended to the option document, no later than the expiration date. A non-refundable option fee, normally expressed as an amount per calendar month, is paid by the named licensee to the licensor as a consideration for the exclusive period being offered. The period is used to carry out a more detailed assessment of the opportunity and it is conventional for exercise of the option to be followed by signature of the licensing agreement (which is appended to the option document) without further negotiation of the main terms. This tactic is widely used when the opportunity deals with rights that are either at a very early stage of definition e.g. a patent application or deal with a novel development whose commercial significance is hard to assess.

A number of points are to be noted when agreement appears to be in view, as demonstrated by acceptance of the option route or by signing a 'heads' document.

- 1. When negotiating through or toward a first or revised draft of the licence, it can be helpful after each session to make up a list of all points agreed upon and propose that each party date and countersign the document.
- 2. Alternatively, where a number of issues seem to remain open and are still to be settled, it is even more helpful to make a list of unsettled points. These can then constitute the agenda for a final session. Sometimes an entire session is needed just to compile a list. This is not to be regarded as a setback rather it should be taken as an opportunity for reflection on and discussion of any alternative ways forward which can be subsequently proposed at the next negotiation session.
- 3. Another variant on this approach is to negotiate through the draft licence or a list of negotiable points as if it were an agenda. All difficult sticking points should be tabled for later discussion and any previously settled point, which is brought up again, is to be ruled 'out of order'. Once the entire draft document or list is agreed then the problem areas can be reconsidered.
- 4. The one phrase known to all people in all countries in all languages is 'OK'. In international negotiations 'OK' means 'that point is agreed'. Avoid any statements where yes 'I understand you' can be confused with yes 'I agree to that or with you'.

To achieve agreement in principle, certain basic guidelines may be of help:

- 1. Make sure all negotiators win something when proposing an agreement in principle.
- 2. If concessions are necessary then make them gracefully and only in small steps. Large concessions cause negotiators to have second thoughts and to question just how far they really can go. They will become suspicious of both your motives and the relative strength of your position and even become obdurate.
- **3**. Identify the key person and ensure that their concerns are answered, perhaps offering them a benefit to be passed on to the other members of their team.
- 4. Set a time deadline and stick to it.
- 5. Strive for what is possible but be flexible where feasible.
- 6. Try to be positive and constructive in all discussions.

7. Ensure that each spokesperson or team leader is empowered to enact an agreement, i.e. avoid referral back to 'management'. Otherwise there is no negotiation only a meeting in which the participants are merely a sounding board or acting as a postal system. Such situations are both frustrating and wasteful of time.

Negotiation tactics

- 1. The most dangerous outcome of a licence negotiation is the mutual perception of a win for one party and a loss for the other. A licence agreement arising from a negotiation where one side was 'all win' and the other side 'all loss' will give problems and difficulties sooner or later.
- 2. Never be satisfied with too low aspirations. They merit and receive little reward.
- **3**. Miscalculation of needs or sensitive points may lead to a bad licence deal, which has been obscured by acceptance of partial success.
- 4. Do not make large concessions early in the negotiation. Deadlock is not to be feared, as on some occasions it is exactly what is needed to focus the attention of all parties on the essentials. Come back to the deadlocked point the next day. Avoid too rapid settlements in anxious attempts to close a deal.
- 5. Keep to a well defined time-frame. The absence of a deadline can be a real barrier to final agreement and is a waste of valuable time.
- 6. Do not allow team members to:
 - Answer questions put to the other side.
 - Debate negotiable points with the potential client over drinks and dinner or at informal social occasions.
- 7. Note that insufficient planning and preparation lead to poor results in many a negotiation.
- 8. Set a clear, written agenda and ensure that you exclude all discussion of items not on the agenda or yet to be reached on the agenda.
- 9. Make an opening statement of what is at stake and objectives to be met.
- **10**. Float a 'trial balloon', the advantage being that even the person floating it can disclaim it in the event of dispute.
- 11. Claim that a particular point is 'standard in all of our licences'.

- **12**. Use a reliable intermediary to confide to the other side that a particular point is of such prime importance that it cannot be conceded or that because of higher management policy, it must be that way.
- **13**. Emphasise other priorities to show that the licence deal is only one of your responsibilities: 'I am leaving tomorrow, whether or not we have reached agreement as I have other business to attend to'.
- 14. Always be logical and discuss rationally on the basis of clear and verifiable facts. Ensure that you keep to these principles and keep emotions out of sight and sound.
- **15**. Always have some defensive or limited delaying tactics available: 'No authority has been given to me on this matter and it is beyond my limit'; 'my boss is out of the country' and 'we need board approval so we will just have to hold that point until we speak to them'.
- 16. Be open and trusting and show that you have nothing to hide 'You can come and visit our technical facility and production units'. A related tactic is to cultivate a personal basis to the deal: 'my friend' and 'you know I wouldn't be unfair to a friend'.
- 17. Unethical tactics should never be used under any circumstances. These include the use of false numbers, false or inflated values, and overselling the qualities of the licensed product to such an extent that claims are untrue. False advice as to what the language means; the personal payment of 'hidden' commissions etc. are to be avoided.

In summary only use the tactics listed above with proper professional judgement and due caution. Ensure that personal and professional integrity is maintained at all times.

How to fail without really trying

As opposed to the positive advice given above there are a number of actions that are guaranteed to produce an unsatisfactory outcome. The examples quoted below arise from personal observation of the events described. They are not figments of the imagination and no doubt there are others of equal effect!

- **1**. Always discard in advance any proposal you think will produce an objection from the other side.
- 2. During negotiation never pose difficult questions.
- 3. Ensure that you signal to your potential licensee that you are desperate to get an agreed licence, signed, sealed and delivered by a specific date.

- 4. Put a premium on being liked by the other side by being gregarious and friendly at the expense of ignoring the substance of the licence.
- 5. To ensure short-term harmony, yield and give way to any pressure by a step-by-step process away from an equitable position.
- 6. Beware of international deals with organisations in countries with significant time zone differences. 'Fly all night, drink, don't sleep on the airplane and start negotiations as soon as you arrive to demonstrate your tough character.' The spectacle of someone falling asleep during a meeting within hours after arrival from a transatlantic flight is neither a novel phenomenon nor is it totally unexpected.
- 7. Leave no time to study basic terms and convey the attitude of 'let's see how we progress'.

Checklist for preparing a licence negotiation

This list is compiled as an aide-memoire for both licensors and licensees alike as preparations are made to negotiate a licence.

- 1. Review previous licence negotiations, which ideally have been recorded in writing and refresh your memory as to what worked last time. What strategies and tactics were used? What was learnt from the other party's tactics? What was the final outcome? Were the final terms palatable and how different were they from the initial draft?
- 2. Write down succinctly what are perceived to be the main issues in the current negotiation. Make a careful note of your position, objectives and negotiating limits and your perceptions of the other party's position and objectives.
- **3**. Think through the position of the other party and find out who is responsible for their team. Who is he or she and what authority do they have? What are their likely strategies/tactics? What are their strengths/ weaknesses? What are their needs, objectives and time frame limits? Where is compromise possible or to be expected?
- 4. Assign roles to members of your own negotiating team as a function of their skills. Who takes minutes and notes? Specify and allocate responsibilities; it is essential to have only one identified official spokesperson on main points.

- 5. Based on this preparation clarify strategic and contingency plans, ensuring that all team members fully understand them. How much do you disclose and when?
- 6. Prepare a checklist with copies to all team members. This must detail as an absolute minimum what is to be negotiated, point by point. Check all points against what the other party wants or needs. Explain why, when and who is to ask for a break (the term 'a time-out' from American basketball is widely used in many countries to describe this request). Inform all the team on 'cautions' or contingency phrases to be used either to prepare your team for any changes in the tactics which are required or to indicate that a disaster is imminent.
- 7. After the initial sessions are over, review progress made to date and as a function of this review re-establish specific goals for the next phase of negotiations.
- 8. After each negotiation session, preserve all notes so that they can be reviewed before resuming the process. In addition they will provide a concise history of each negotiation and establish a case-file both for training purposes and the creation of a reference base for the future.

Specific problems that can be encountered

PATENTS

SOFTWARE

DATABASES

BRAND LICENSING



Chapter 8: Specific problems that can be encountered

Patents

The different types of intellectual property can give rise to specific problems in drafting licensing agreements, which allow the intellectual property in question to be commercially exploited. Some of the relevant issues will be presented in this chapter. One of the major differences arises from the amount of information which is to be transferred in addition to the specific piece of property being licensed. At one extreme there are so called 'bare licences' typified by most agreements involving trade marks and copyright where the statutory or registered rights or the copyright work comprise the totality of the property being licensed. The polar opposite is to be found in some technology licences where know-how is the only asset being conveyed. In the latter case great care is required during negotiation to ensure that valuable information is not inadvertently revealed prior to the agreement being signed. Most patent licences fall into the broad middle ground between these two extremes where the patent claims require practical support to enable the invention to be reduced to profitable action. One specific feature of technology licences is the definition of a field of use because a significant number of patents can be used in a variety of industrial applications. A licensee will be strictly limited as to what can be done under the licence and it is thus important that the field of use be carefully defined and limited. After all the licensor is seeking income from their licensees' actions and the exact areas of business where the patent is to be exploited must be known and be identifiable. All patent licences must be in writing and signed by all parties. Exclusive licensees can initiate legal proceedings on infringement issues provided that they are joined by the owner of the patent. A similar provision applies to copyright licences.

Software

One area of licensing which has grown both in volume and in value in recent years is that of computer software and there is no user of a personal computer who quite literally has not had contact with a licence governing the terms under which access is granted to word processing and spreadsheet software. The licence document is contained within a 'shrink-wrap' transparent package and the very fact of opening the wrapping amounts to acceptance of the terms.

Software can be classified into application software for specific tasks and operating systems software for hardware. Programs for these two types of software exist as codes; either as the source code or the object code. Copyright protection is granted to software as computer programs are excluded from the category of patentable inventions although they can be part of an overall invention that is patentable. The owner's permission is thus needed for all acts relating to the copying or altering of the work so that it can be put into another language. This permission is given by way of a licence and this is the dominant route for the commercial exploitation of software.

Storing a program in the memory of a computer is covered by the term 'copying' and hence can be considered as infringement in the absence of a licence. Exceptions to this rule on copying are: back-up copies made by a user and so called 'decompilation' acts, which enable another computer program to be created. Software licences can be classified as being either for an end-user, for development purposes or for commercial distribution.

End-user agreements can be evaluated as a function of the relevant objectives. Three issues arise:

- 1. Agreement structure
- 2. Specification of the software
- 3. Scope of the licence.

The main point on structure is whether or not the licence is for one organisation or for a number of units within the same organisation. The licensor's problem is to ensure that all users within a group are identified and duly authorised, possibly by way of a sub-licence, so that the appropriate royalty fee can be determined and paid upon signature of the agreement. As new and better products can be speedily developed by competitors, most software programs have a relatively short working life and licensors would be well-advised to request all payments to be made 'up-front' as the idea of regular royalty fees based on regular sales being paid over a number of years is unlikely. The software must be described fully in a specification document so that its performance, capabilities and functions can be revealed to the licensee. The scope of a software licence deals with issues such as duration, degree of exclusivity granted (exclusive licences are very rare unless a bespoke or customised approach is taken to the design of software), location of use and rights to its use on networks, updates and whether they are to be the subject of further payments etc. It is important that the licensor provide warranties as to ownership of the rights and also as to performance as expressed by its functions and as stated in the documentation accompanying the licence.

In contrast to the broad end-user agreements, development licences are narrow and specific. Their creation takes time and agreements should reflect this fact, for example by providing for stage payments to be made as a function of specific, mutually agreed milestones being satisfactorily reached within an agreed timescale. Distribution licences present no particular problem although it should be made clear as to who precisely is the licensor by specifying whether the licence is purely for distribution purposes or for copying and onward use by sub-licensees. One novel feature of software licences resides in the expression of the software in a codified form. If the licence only covers the object code then it is advisable to provide that the source code is held by an independent or escrow body that could make the code available for defined situations such as bankruptcy of the licensor. This sort of provision will enable the licensee to continue to operate the software in the absence of the original licensor. Any alert licensor will pay attention to the possibility of contingent liability arising when use of the licensed software causes quantifiable damage. Adequate insurance should be taken to cover such eventualities.

Databases

In general and in a similar way to software, databases are also protected by copyright. Information has both content and form (in that the data can be presented in specific and distinctive formats which make it more useful to the end-user) but there is not necessarily any creative effort involved in devising any particular layout. The publication of a European Union Directive 96/09/EC entitled 'The legal protection of databases' changed this general approach to EU copyright law. An exclusive right was created to protect databases as being commercially valuable works in which a level of intellectual creativity is evident. Somewhat unexpectedly the officials added the provision that there had to have been substantial investment in this process (compare this novel idea with an invention capable of patent protection where the investment is often large but is irrelevant to the patentability issue). The commercial exploitation of databases usually proceeds by granting access rights and rights of use. The latter may include the making of

printouts of the information but excludes copying and the passing on of the information to unauthorised third parties. Two commercial issues are relevant:

- 1. The responsibility of the licensor for the accuracy of the data and related liability;
- 2. The basis on which fees are to be paid by the user or licensee.

Copyright online

A recent development in the EU with an immediate impact on licensing has been the publication on 9 April 2001 of a new directive on copyright, which has to be incorporated into national law before 22 December 2002. The rapid development of online access to information and on-demand supply of copyright works has led to real difficulties with respect to copying and copyright ownership and this new law is designed to respond to the identified problems. The directive gives copyright owners an exclusive right to authorise or prohibit copies of their works and also to control communication to the public by both wired and wireless means. This latter point takes account of the Internet and ondemand services. One interesting feature of the new provisions is the protection offered against those who try to circumvent installed, anti-copying technology including the distribution of this information via websites. All exclusive copyright licences must be in writing and signed by the licensor.

Brand licensing

Brand licensing is a term used to describe licences which cover distinctive characteristics of a service or product, for example shape, name and smell. Trade marks are thus the subject of many commercial licensing agreements and should be registered so as to offer strong support to the prosecution of possible future infringement actions. When the mark is registered there is neither the need to prove that there is goodwill or reputation attached to a mark nor that confusion has resulted; whereas for unregistered marks 'passing off' actions require both proof of reputation and proof that confusion of the public has arisen. Licensors in this commercial area will be well aware that imitation is a constant risk to their business and they must be prepared to defend their intellectual property at all times. Licences must identify the marks being offered and specify the services and products to which they are to be applied by the licensee as well as the territorial limits of their use. The royalties to be paid will be a function of the degree of exclusivity provided by the licence. Since the mark is an indicator of quality and reputation it is important that the licensee be constrained to meet

these requirements for the goods bearing the licensed mark and the licensor's rights to control the quality of marked goods and how the mark is used are clearly stated in the agreement. All trade mark licences must be in writing and signed by the licensor.

The owner of the licensed mark will want to control the conduct of any infringement action and the licence should contain a clause to make this clear and also to ensure the full cooperation of the licensee in such action. An exclusive licensee may also bring legal proceedings if they are granted the right and are joined by the licensor.

Managing a licensing operation

PORTFOLIO MANAGEMENT MANAGING THE LICENCE AGREEMENT AFTER ITS SIGNATURE REASONS WHY LICENSING AGREEMENTS FAIL THE LICENSING FUNCTION



Chapter 9: Managing a licensing operation

Portfolio management

The first responsibility of the manager of a licensing unit is to oversee the establishment of a portfolio in which the rights available for licensing are identified and full details listed, together with those topics that are to be licensed-in by the company. Maintaining the intellectual property rights in force after they have been identified and protected by the appropriate means is essential and this can be delegated to a licensing operation so that there is no danger of a loss of rights occurring as a result of each department assuming that action has been taken by someone else. If outside legal advice on a proposed licence is to be taken then this should be the responsibility of the individual who is to negotiate the deal. The costs incurred will also be allocated to the licensing budget.

The overall analysis of the various points relating to the economic viability of any one proposed licence agreement is clearly the responsibility of the licensing unit and this is particularly the case when the co-ordination of different inputs from various sources is necessary. When the licence has been drafted, negotiation completed and agreement reached there is an understandable tendency to assume that the job is effectively finished and attention can be turned to the next deal. This is not so. Management of the on-going agreement cannot be ignored even though practice suggests that this is all too frequently the case. Post-signature management of licences is essential as the next section indicates.

Managing the licence agreement after its signature

The following factors require consideration by those responsible for a licensing agreement after its signature. More particularly they demand management time and effort and a clear understanding as to how responsibilities are to be allocated across functional boundaries such as legal, technical, financial etc., if all these points are to be covered adequately.

- 1. Personnel: functions and specific responsibilities.
- 2. Improvements:
 - a) Communication of;
 - b) Ownership of and entitlement to use;
 - c) Prosecution of arising patent applications.
- 3. Competition law: limitations on actions and legal impact on rights.
- 4. Maintenance of property rights: formal fee payments.
- 5. 'No challenge' issues.
- 6. Policing of possible infringement and approval of arising litigation action.
- 7. Warranties.
- 8. Marking of goods and approval of advertising material.
- 9. Multiple licences, sub-licences and cross-licensing.
- **10**. Quality control: monitoring of licensed products.
- 11. Diligence: ensure compliance with criteria.
- 12. Receipts and payments:
 - a) Amounts due;
 - b) Timing of receipts, specified currency;
 - c) Royalties/maintenance fees;
 - d) Notices re. penalties for late dispatch.

Reasons why licensing agreements fail

Although licensing agreements are negotiated in the anticipation of success there is a great deal of evidence that this is not always so. Analysis of the experience of a number of organisations and individuals who have managed licensing agreements suggest some key issues which, if mishandled, will result in failure of the arrangement. These are listed below as reasons for failure and are in descending order of relative importance. They should be regarded as guidelines, not as hard and fast rules. The most interesting features are the crucial role of market decisions and their impact on the likely success of a licensing deal and the relative unimportance of the technical content of the agreement. More precisely this analysis suggests that it is relatively unusual for the technology not to work as forecast and planned. Markets appear to change more rapidly than technology; hence the negative impact of a market misjudgement is all the greater and the economic consequences all the more serious. This insight also explains why 'technology push' should be treated with caution and 'market pull' preferred when deciding on the relative merits of alternative licensing deals.

- 1. Misjudgement of markets
 - Economic size and dynamics
 - Impact of technological change on a given market
 - Role of the licensed product or process within the market.
- 2. Managerial inadequacies
 - Marketing efforts
 - Technology management.
- 3. Lack of 'product champion'
 - Absence of involvement and support of senior level management within the licensee company.
- 4. Technological deficiencies
 - Failure to introduce technology successfully
 - Failure of personnel: usually a lack of technical competence.
- 5. Weak patents
 - Narrowness of claims
 - Competitive patents
 - Process patents are difficult to monitor.

The licensing function

The ideal licensing executive has the following personal qualities and job experience: a technical education and professional background; basic legal training and sound knowledge of patent law; market research and technical development experience; an ability to empathise with people; salesmanship; a sound grasp of commercial and financial matters; enjoyment of the negotiation process; foreign language abilities.

If a choice has to be made then for most licensing deals technical understanding allied to negotiation skills is probably of greater value than legal ability. If such polymaths exist then he or she is clearly worth their weight in gold! The scope of the job can encompass all purchase and sale of technology, including both inand out-licensing operations, and joint ventures and is often concerned with company formation, as well as the buying and selling of subsidiary companies when intellectual property assets are of importance. The ideal big company licensing department is separate from patent, legal and technology functions but works closely with each of these plus the heads of operating divisions. Typical small to medium companies often employ an independent lawyer, consultant or specialist company to handle licensing matters for them. This is a tendency which is increasing as this size of company appreciates the financial value of licensing, especially in the context of the EU single market. The smaller company will often use a patent agent on a part-time basis or the technology director part-time to work on licensing deals. The very small company, aware of the value of licensing, but with limited human resources may have to use the managing director to handle such matters.

Typical examples of licensing agreements

- EXAMPLE 1: LICENCE AGREEMENT FOR KNOW-HOW PROVISION AND TECHNICAL PROCUREMENT ACTIONS
- **EXAMPLE 2: LICENCE OPTION AGREEMENT**

EXAMPLE 3: LICENCE AGREEMENT WITH PROVISION FOR SUB-LICENSING TO VARIOUS PARTNERS IN A MULTINATIONAL CONSORTIUM

EXAMPLE 4: PATENT LICENCE AGREEMENT

EXAMPLE 5: SUB-CONTRACT AND DEVELOPMENT AGREEMENT



Chapter 10: Typical examples of licensing agreements

Five types of licensing agreement are contained in this chapter. They are actual examples of real commercial situations with which the author was concerned and illustrate the various problems which can arise in licensing patents, know-how, designs and copyright. One particularly deals with the transfer of confidential information for development and sub-contracting purposes, another with a complex set of relationships within a multi-partite consortium and yet another with an option situation. They are not to be taken as templates for general use but rather as indicators of the various points that have to be carefully considered and then put into language which expresses the intents of all parties.

Example 1

Licence agreement for know-how provision and technical procurement actions

This Agreement is made this	day of	1980 by and between
		, England
(hereinafter referred to as 'Licenso	or') of the one part a	nd
of Mos	scow, USSR (hereinaf	ter referred to as 'Licensee')
of the other part.		

WHEREAS:

- Licensor has developed a process for the manufacture of glass fibre;
- Licensor possesses technical knowledge, experience and know-how relating to the said process;
- Licensee wishes to acquire a licence to use the said process, to use the said technical knowledge, experience and know-how and to have the benefit of technical assistance from the Licensor, for the purpose of making, using and selling the Product as hereinafter defined.

NOW THEREFORE the parties hereto agree as follows:

1. **DEFINITIONS**

For the purposes of this Agreement the following words and expressions shall have the meanings set forth below:

- 1.1 'Products' shall mean baseplates for Use in the fabrication of glass fibre and having the technical characteristics as set forth in an Appendix. (Not attached.)
- 1.2 'Process' shall mean all technological processes and special methods used by Licensor to manufacture, test and control the quality of the Products.
- 1.3 'Equipment' shall mean machinery and instrumentation recommended by Licensor for the manufacture of the Products by means of the Process, and including Equipment for the testing and control of the quality of the Products brief particulars of Equipment being contained in Appendix 3 (page 114).

- 1.4 'Know-how' shall mean engineering and technical knowledge and experience essential to or primarily useful in the design and operation of the Process, now in the possession of, or acquired by, the designated party, but excluding any such knowledge and experience relating to the method of manufacturing Equipment and, in respect Know-how acquired by Licensor after the date of execution of this Agreement, only to the extent and subject to the terms and conditions under which Licensor has the right to disclose such Know-how without obligation to others and free from any restrictions imposed on such disclosure by the Government of the United Kingdom. Know-how furnished or made available to Licensee by any sub-licensee pursuant to Sub-paragraph 9.3 (d) below shall be deemed to be the Licensee's Know-how for the purposes of this Agreement.
- 1.5 'Technical Documentation' shall mean Know-how in the possession of Licensor at the date of execution of this Agreement as updated as the Licensor may at its discretion determine prior to its transmission to Licensee hereunder, and reduced by Licensor to writing and/or diagrams and/or drawings and/or written specifications. Brief particulars of Technical Documentation are set forth in an Appendix (not attached).
- 1.6 'Affiliate' shall mean any company that is a holding company of Licensor or a subsidiary of any such holding company (as defined by the United Kingdom Companies Act, 1948).
- 1.7 'Effective Date' shall mean the later to occur of a) the date of approval, if required, of this Agreement by the appropriate department of the Government of the United Kingdom and b) the date of the approval of this Agreement by the appropriate agency of the Government of the USSR.
- 1.8 'Patents' of the designated party shall mean any patents and patent applications owned and controlled by the designated party to the extent that the claims thereof cover the Process and any improvement thereof and which are essential to or primarily useful in the operation of the Process based on inventions conceived or reduced to practice by Licensor or Licensee during the term of this Agreement, to the extent that, and subject to the terms and conditions under which, the designated party can grant, transfer or otherwise extend such rights without obligation to others.
2. THE SUBJECT MATTER OF THE AGREEMENT

- 2.1 The purpose of this Agreement is the grant by Licensor to Licensee, subject to the terms and conditions of this Agreement, of a non-exclusive right to use Know-how and Technical Documentation of Licensor for the purpose of the production, use and sale of the Products in the territory of the USSR.
- 2.2 Subject to the terms and conditions of this Agreement, Licensor undertakes to transmit Technical Documentation to Licensee and to render technical assistance to Licensee pursuant to and in accordance with Articles 3 and 6 respectively hereof.
- 2.3 During the life of this Agreement each party will inform the other of Know-how developed by it, pursuant to and in accordance with Article 8 hereof.
- 2.4 The procurement by Licensor of certain items of Equipment for Licensee is covered by a separate contract between the parties.
- 2.5 For the avoidance of doubt, it is hereby declared that nothing in this Agreement shall operate to place on Licensor any obligation to disclose to Licensee any information of Licensor relating to the melting, refining and/or alloying of ______ or to the production of sheet material of ______ and/or their alloys required for use in the Process.

3. TECHNICAL DOCUMENTATION/KNOW-HOW

3.1 Within sixty (60) days after receipt by Licensor of the payment to be made by Licensee under Sub-paragraph 5.1 (a) below, Licensor shall transmit Technical Documentation to Licensee. Transmission shall be effected, at Licensor's option, either a) by handing over in Moscow by a representative of Licensor to a representative of Licensee duly-authorised to receive the same who shall sign and hand to Licensor's representative a receipt for the Technical Documentation or b) by air carrier to Licensee via Sheremetjevo Airport, Moscow. The date of transmission of Technical Documentation to Licensee (hereinafter called 'the Transmission Date') shall be the date of the receipt issued pursuant to a) above or the date of the relevant airway bill under b) above, as applicable.

- 3.2 a) Promptly after the Transmission Date, Licensee shall commence a review of the Technical Documentation and if Licensee discovers that any Section or Sub-section (as set forth in an Appendix) has been omitted or requires clarification, it shall as soon as such discovery is made but in any event within forty-five (45) working days after the Transmission Date, notify Licensor by telex with full details of the omitted Section or Sub-section or the Section or Sub-section requiring clarification, as the case may be.
 - b) If notification is given by Licensee to Licensor under Sub-paragraph 3.2 (a) above, Licensor shall transmit the omitted Section or Sub-section or the required clarification, as the case may be, to Licensee by either of the methods set forth in Paragraph 3.1 above within thirty (30) days from the date of receipt of Licensee's said notification.
- 3.3 Should there be a delay in the transmission by Licensor to Licensee of either:
 - i) Technical Documentation under Paragraph 3.1 above or
 - ii) any missing Section or Sub-section or clarification under Subparagraph 3.2 (b) above and provided that without such Section or Sub-section or clarification the Technical Documentation previously transmitted by Licensor to Licensee is rendered worthless to Licensee, then, in either such case and provided that such delay continues for at least ______ months, Licensee shall after the expiry of such period have the right to terminate this Agreement forthwith by written notice to Licensor, such notice specifying the grounds for such termination, without prejudice to Licensor's right if it disputes the validity of the Licensee's grounds for termination and therefore the validity of such termination, to refer such dispute to arbitration in accordance with Article 15 hereof.
- 3.4 For the purpose of this Agreement, the Acceptance Date shall be whichever occurs first of:
 - a) the date forty-five (45) working days after the Transmission Date if within such period no notification has been given by Licensee to Licensor pursuant to Sub-paragraph 3.2 (a) above;
 - b) the date when notification shall have been given by Licensee to Licensor pursuant to Sub-paragraph 3.2 (a) above provided that the omission or clarification to which such notification refers is not such that, if not remedied or given by Licensor, it would render worthless to Licensee the Technical Documentation previously transmitted by Licensor to Licensee;

- c) if Licensee shall have given notification to the Licensor pursuant to Sub-paragraph 3.2 (a) above and the Technical Documentation previously transmitted by Licensor to Licensee shall be worthless to Licensee without the missing Section or Sub-section or the clarification to which such notification occurs, the date when such missing Section or Sub-section or clarification is transmitted by Licensor to Licensee, notwithstanding that such missing Section or Sub-section or clarification may itself in the opinion of Licensee be incomplete or require further clarification as the case may be; and
- d) the date when Licensee issues to Licensor a Technical Documentation Acceptance Statement.
- 3.5 The sole and exclusive rights of Licensee with regard to a delay in the transmission of Technical Documentation or of any missing Section, Subsection or required clarification as aforesaid are fully contained in Paragraph 3.3 above.
- 3.6.1 Technical Documentation shall be prepared in conformity with Licensor's current technical standards.
- 3.6.2 Technical Documentation shall be in the English language, be in the metric system of units and contain explanations of any symbols, abbreviations and references to Standards of any governmental or other body, referred to therein.
- 3.6.3 Drawings, diagrams and layouts included in Technical Documentation shall each be supplied in three (3) copies plus one (1) transparency. Textual matter included in the Technical Documentation shall be supplied in five (5) copies.
- 3.6.4 There shall be transmitted to Licensee simultaneously with the transmission of the Technical Documentation, ten (10) copies of Appendix 3 hereto; five (5) copies of which shall be in the English language and five (5) copies of which shall be in the Russian language.

4. FAILURE TO IMPLEMENT PROCESS, ETC.

- 4.1 Licensor confirms that it owns the Know-how to be transmitted by Licensor to Licensee hereunder and has full power and authority to enter into this Agreement and to grant the rights and licences hereby granted.
- 4.2 To the best of Licensor's knowledge and belief, the Process will, provided Licensee (a) correctly uses and applies Technical Documentation (b) observes Licensor's instructions and recommendations, whether

contained in Technical Documentation or otherwise disclosed or made by Licensor to Licensee and (c) uses Soviet raw materials having the characteristics specified in the Technical Documentation, be suitable for the intended purpose.

- 4.3 The Technical Documentation to be transmitted by Licensor to Licensee will incorporate Know-how in the possession of Licensor at the date of execution of this Agreement as updated as Licensor may at its discretion determine prior to its transmission to Licensee hereunder.
- 4.4 Licensor will ensure that Licensor's technicians rendering technical assistance under Article 6 hereof will be suitably qualified and conversant with the Process.
- 4.5 The Licensee undertakes to supply to the Licensor within 30 days of the Acceptance Date a set of drawings detailing three different specific designs of Products but each complying with the specifications contained in an Appendix. (Not attached.)
- If within twelve (12) months from the Transmission Date Licensee shall 4.6 have failed to manufacture by means of the Process any one Product referred to in 4.5 above then, if Licensee can establish that such failure was due entirely and solely to non-observance by Licensor of the provisions of this Agreement, Licensee shall at the end of such period of twelve (12) months notify Licensor in writing of such failure, such notice containing full particulars of the non-observance. Licensor shall use its reasonable endeavours to make good such non-observance but if it fails to do so within six (6) months from the date of Licensee's notice, Licensee shall be entitled forthwith to terminate this Agreement, by notice to Licensor and, provided Licensee first returns to Licensor Technical Documentation and all copies or reproductions thereof made by Licensee with the agreement of Licensor, Licensor shall return to Licensee all sums previously paid by Licensee to Licensor under Article 5 of this Agreement.
- 4.7 For the purposes of Paragraph 4.6 above, Licensee undertakes to keep Licensor fully and regularly informed during the said period of twelve (12) months as to the progress of the Licensee in implementing the Process and manufacturing Products by means thereof and Licensee shall maintain, and for six years at least, retain, full, true and clear records of such progress and manufacture, such records to be open to inspection at all reasonable times and upon reasonable notice, by duly-authorised representatives of Licensor.

- 4.8 Any payment obligation of Licensee to Licensor under Article 5 hereof which shall arise prior to termination of this Agreement by Licensee in accordance with Paragraph 4.6 above shall in no event be postponed or deferred by Licensee's failure to manufacture under the said Paragraph 4.6, but without prejudice to Licensee's right of recovery under said Paragraph 4.6.
- 4.9 For the avoidance of doubt it is hereby declared that:
 - a) without prejudice to the provisions of Paragraph 4.6 above, in no circumstances shall Licensee be entitled to terminate this Agreement under Paragraph 4.6 if its failure to implement the Process as aforesaid is due, wholly or in part, to Licensee's failure to manufacture or acquire any raw material for use in the Process complying with any specifications therefore contained in the Technical Documentation;
 - b) the right of termination contained in Paragraph 4.6 is the sole and exclusive right and remedy of Licensee for failure to implement the Process for the reason therein specified.

5. COMPENSATION AND TERMS OF PAYMENT

- 5.1 In consideration of the rights granted and Know-how to be transmitted by Licensor to Licensee and for the technical assistance to be rendered by Licensor to Licensee, Licensee agrees to pay to Licensor a licence fee of Three hundred and fifty thousand pounds sterling (£350,000) as follows:
 - a) One hundred and twenty-five thousand pounds (£125,000) within thirty (30) days from the Effective Date.
 - b) One hundred and twenty-five thousand pounds (£125,000) within thirty (30) days after the Acceptance Date.
 - c) One hundred thousand pounds (£100,000) upon whichever first occurs of:
 - i) the date twelve (12) months after the Effective Date, and
 - ii) the date thirty (30) days after the date when, by use of the Process, Licensee shall have completed the manufacture of ten (10) of each of three designs of Products.

Which full payment shall constitute a paid-up right and licence to use the Process for the purpose of the production, use and sale of the Products in the USSR which right and licence shall be non-exclusive and, save as otherwise provided herein, irrevocable and non-transferable.

5.2 For the purposes of Sub-paragraph 5.1 (c) (ii) above, Licensee shall, during the period of twelve (12) months after the Effective Date, keep Licensor fully and regularly informed as to the numbers, types and quality of Products manufactured by Licensee in such period by means of the Process and shall maintain, and, for six years at least retain, full, true and clear records of Products so manufactured in such period, such records to be open to inspection at reasonable times and upon reasonable notice, by duly-authorised representatives of Licensor.

6. TECHNICAL ASSISTANCE

- 6.1 Upon written request of Licensee made within twelve (12) months after the Effective Date, Licensor shall at such time or period as shall be agreed between the parties but in any event not before the date of receipt by Licensor of the sum payable by Licensee pursuant to Sub-paragraph 5.1 (b) above, perform a reasonable number of laboratory analyses and tests on samples of raw materials and other materials proposed by Licensee to be used in the application of the Process in substitution for materials used by Licensor, such samples to be supplied by Licensee free of charge to Licensor, and Licensor will, but without liability on its part, make recommendations to Licensee as to the suitability or otherwise, as determined by such analyses and testing, of such proposed materials.
- 6.2.1 Upon request of Licensee, Licensor will at a time to be agreed between the parties but in any event not before the date of receipt by Licensor of the sum payable by Licensee pursuant to Sub-paragraph 5.1 (b) above, admit two of Licensee's technicians into Licensor's plant at
- 6.2.2 Licensor shall train each such technician in the operation of the Process, including all stages of production of Products by means of the Process and the methods of testing and control of the quality of Products, the total training time not to exceed eighty (80) man working days including the working days of any interpreter as provided by Licensee under Sub-paragraph 6.2.3.
- 6.2.3. If neither of the said technicians are fully conversant with the English language, both written and oral, they shall be accompanied by an interpreter provided by Licensee.
- 6.2.4. Training of the technicians by Licensor shall be carried out free of charge, but all travel, living and accommodation costs and expenses relating to the visit of the said technicians and of the interpreter (if any) shall be borne by Licensee.

- 6.2.5 Licensee will ensure that the said technicians and interpreter (if any) will abide by all site regulations concerning work discipline, safety, security and the right of search and any instructions given by the plant manager or other person designated by him at the said plant in respect of such matters as if the said technicians and interpreter were employees of Licensor.
- 6.3.1 Upon Licensee's written request, Licensor undertakes to send technicians of Licensor to any plant or plants of Licensee in the USSR nominated by Licensee to render technical assistance to and train Licensee's personnel in the practice of the Process.
- 6.3.2 The said visit or visits shall be made at a time or times to be agreed between Licensor and Licensee, but in any event not before the date of receipt by Licensor of the sum payable by Licensee pursuant to Subparagraph 5.1 (b) above. The duration of the said visit or visits shall not exceed in aggregate sixty (60) man working days on the territory of the USSR.
- 6.3.3 a) Licensee shall pay to Licensor the expenses connected with the travel of Licensor's technicians from London to the USSR by air, economy class. Licensee shall also provide free of charge the hotel accommodation in the USSR and transport facilities from Moscow to the place of their work at the plant of Licensee and return.
 - b) The railway tickets (compartment coach) or the air tickets to go from Moscow to Licensee's plants implementing the licence and return to Moscow and also to go from Moscow to London shall be purchased by Licensee at its own expense and handed over by it to Licensor's technicians.
- 6.3.4 Licensee shall pay to each of Licensor's technicians each day of their stay in the USSR, a daily allowance of ten (10) Soviet roubles.
- 6.3.5 All other costs and expenses, including salaries, relating to the visit of the Licensor's technicians shall be paid by Licensor.
- 6.3.6 The travelling expenses of Licensor's technicians from London to Moscow shall be paid by Licensee within thirty (30) days after presentation by Licensor of a) the invoice received by it in respect thereof and b) copies of the air tickets.
- 6.4 Licensor and Licensee shall each render all reasonable assistance and support to the other in any application by that other for any visas or like governmental permissions required for any of the visits above referred to.

7. TAXES AND DUTIES

All taxes, duties and similar expenses connected with the concluding and implementing of this Agreement and due to be levied in the territory of the United Kingdom shall be borne by Licensor.

All taxes, duties and similar expenses connected with the concluding and implementing of this Agreement in the territory of the USSR shall be borne by Licensee.

8. TECHNICAL IMPROVEMENTS ETC./PATENTS

- 8.1 Licensor shall, on a non-exclusive basis and to the extent it has a right to do so without obligation to others, and without any payment or accounting therefore to Licensor, furnish or make available to Licensee during the term of this Agreement all Know-how acquired by Licensor after the Effective Date, and which Licensor deems necessary and useful in the practice of the Process.
- 8.2 Licensee shall, on a non-exclusive basis and without any payment or accounting therefore to Licensee, furnish or make available to Licensor and through Licensor, to each Affiliate, during the term of this Agreement, all Know-how acquired by Licensee after the Effective Date.
- 8.3 Licensor hereby grants and agrees to grant to Licensee a non-exclusive, royalty-free and non-transferable licence under Russian Patents, if any, of Licensor to practice the Process in the USSR.
- 8.4 Licensee hereby grants and agrees to grant to Licensor, and through Licensor to each Affiliate, an irrevocable, non-exclusive, non-transferable (except as provided under this Paragraph 8.4) and royalty-free licence under Licensee's Patents (if any).
- 8.5 Notwithstanding the foregoing grants under Patents, neither party makes any representation concerning the existence, scope or validity of any Patents, and the amount of any monies herein agreed to be paid shall not be reduced or otherwise affected because of the non-existence, limitations on scope, or invalidity of such Patents.

9. CONFIDENTIALITY/SUB-LICENSING

- 9.1 Licensee acknowledges that Licensor is the proprietor of the copyright in the documentation comprising Technical Documentation and other paper or photographic manifestations of Technical Documentation.
- 9.2 Except as otherwise provided in Paragraphs 8.2 and 9.3 hereof, Knowhow furnished by one party to the other is for the sole use of the recipient and for a period of fifteen (15) years from the Effective Date, the recipient shall take all reasonable care to ensure that such Know-how, whether in written, printed, oral or other form, shall not be disclosed to third parties, except insofar as such Know-how (a) was in the possession of the recipient at the time of receipt thereof, (b) is or becomes public knowledge through no fault of the receiving party, or (c) is obtained on a non-confidential basis by the recipient, either directly or indirectly, from a source other than the other party to this Agreement. It is acknowledged by the parties hereto that disclosures heretofore made by Licensor and the terms of this Agreement shall themselves be treated as confidential in accordance with the foregoing provisions. Licensee agrees to make available for review to the Licensor any patent application or publications of Licensee and any sub-licensee under Paragraph 9.3 below relating to the Process prior to their filing or publication in order to assure their conformation to the terms of this Paragraph.
- 9.3 Licensee shall, provided it shall theretofore have paid the total licence fee payable under Paragraph 5.1 hereof, be entitled to grant sub-licences to use the Process, and for that purpose, to disclose Know-how of the Licensor to other government-owned bodies in the USSR only, without any payment to Licensor, provided however that any such sublicence shall contain provisions:
 - a) specifying it as personal to the sub-licensee and non-assignable and excluding the right to sublicence;
 - requiring the sub-licensee to keep confidential and not to disclose to any other body, company or person for a period of up to at least a date fifteen (15) years from the Effective Date all Know-how of the Licensor received by the sub-licensee from Licensee;
 - c) requiring the sub-licensee to use the Process in and only in the USSR;
 - d) requiring the sub-licensee to furnish and make available to Licensee all Know-how developed by the sublicensee, and
 - e) providing for automatic termination thereof if the right of Licensee under this Agreement to use the Process and Licensor's Know-how shall terminate.

Licensee shall take all steps necessary to ensure the compliance by a sublicensee with the foregoing requirements of the relevant sublicence and shall within 30 days after its execution supply Licensor with a true and accurate translation in the English language of any such sublicence.

9.4 Licensee shall indemnify Licensor in respect of any loss, damage or expense suffered or incurred by Licensor by reason of any breach by any sub-licensee of the foregoing provisions required to be included in any sub-licence.

10. EQUIPMENT

- 10.1 There is attached hereto as Appendix 3 a list of Equipment.
- 10.2 To the best of Licensor's knowledge and belief, the said list includes all major items of Equipment but Licensor gives no warranty as to the exhaustiveness thereof nor shall be under any liability whatsoever to the Licensee should the said list be found to be incomplete to any extent. Licensor gives no warranty as to, nor shall be under any liability whatsoever in respect of, the availability or non-availability of the listed items or any of them.
- 10.3 Licensor agrees to render advice and assistance to Licensee in the purchase by the Licensee of any item or items of the Equipment which the Licensee wishes to purchase (but without the Licensor incurring any financial or other liability in respect of such purchase). Licensor is under no obligation, by virtue of this Agreement, to purchase, install or commission on behalf of Licensee any item of such equipment and if Licensee does request Licensor so to do, such activity shall, if Licensor elects, at its sole discretion, to undertake it, be the subject of a separate agreement between Licensor and Licensee and be subject to the obtaining of any governmental consents required therefore and to any governmental laws, rules or regulations preventing, restricting or regulating the same, no such agreement and/or failure or delay in purchasing, installing or commissioning thereunder in any event to affect in any way the obligations and liabilities of the parties under this Agreement.

11. LICENSOR'S LIABILITY

The communication of Technical Documentation by Licensor to Licensee shall be carried out by Licensor in the utmost good faith but, without prejudice to Licensee's rights under Paragraphs 3.3 and 4.5 above, Licensor gives no warranty and shall be under no liability to Licensee or any sub-licensee in respect of the quality or usefulness of Licensor's Know-how or Technical Documentation or technical assistance provided by Licensor under Article 6 and any condition, term or warranty implied by law or custom in relation thereto is hereby expressly excluded. In no circumstances shall Licensor be liable for loss of profits, loss of production or any other consequential loss or damage whatsoever arising whether directly or indirectly from the use by Licensee or any sub-licensee of the Process, of technical assistance and/or Technical Documentation given and/or supplied by the Licensor, or of machinery or equipment used by Licensee or any sub-licensee in the Process.

12. PATENTS ETC.

- 12.1 Licensor agrees to defend and assume the cost of any suit or action brought against Licensee during the life of this Agreement for infringement of any patents of a third party other than Russian patents in existence as of the date of signature of this Agreement, and to hold Licensee harmless from any monetary judgements and awarded costs that may be assessed in or become payable under any final decree or final judgment by any court of competent jurisdiction in said suit or action based solely upon the infringing use by Licensee, during the life of this Agreement, of the Process; provided however, that such infringing use is based on a patent claim which defines the Process to the extent and only to the extent that Licensee's practice of the Process is in accordance with the Technical Documentation furnished by Licensor to Licensee under Article 3, and further provided that an infringing use based on a patent claim which defines Process as one element of a combination, the other elements of which are not part of the Process, is specifically excepted from this indemnification.
- 12.2 Licensee shall notify Licensor promptly in writing after notice is received by Licensee of any such claim of infringement and of the commencement against it of any suit or action, and Licensor and/or its Affiliates shall have the opportunity and right, at its own expense, to direct and control such suit or action; provided, however, that Licensee shall, upon request by Licensor, render all reasonable assistance and co-operation required by Licensor in the conduct of any such suit or action.

- 12.3 The aggregate amount assumed and/or payable by Licensor under any and all claims of infringement under the provisions of Paragraph 12.1 shall not in any event exceed one hundred thousand pounds sterling (£100,000). The foregoing states the entire aggregate liability of Licensor to Licensee for patent infringement.
- 12.4 Notwithstanding the foregoing, the provisions of Paragraph 12.1 hereof shall not apply to any suit or action involving alleged patent infringement where Licensee is prevented from contesting the validity of the patent or patents allegedly infringed, either by estoppel or other course of conduct on the part of Licensee.

13. TERM AND TERMINATION

- 13.1 This Agreement shall become effective on the Effective Date. Each party hereto agrees to be responsible for, and to exert its best efforts to obtain, the approval (if required) of this Agreement by the appropriate agency or department of its Government and shall promptly notify the other by telex or other written communication as specified in Article 18 hereof of such governmental approval or otherwise. Once this Agreement becomes effective, it shall continue in full force and effect for a period of two (2) years from the Effective Date, unless it is terminated prior thereto in accordance with Paragraph 3.3, Paragraph 4.6 or Paragraph 13.2 hereof. The foregoing notwithstanding, if this Agreement has not become effective within six months from the date of execution hereof, either party shall be entitled to terminate this Agreement by notice in writing to that effect to the other party.
- 13.2 If Licensee shall fail or refuse to make the full payment as set forth in Article 5 of this Agreement or if Licensee shall be in default for sixty (60) days in any other obligation hereunder, Licensor may give written notice to Licensee specifying the claimed particulars of such default, and in the event Licensee shall not remedy such default within thirty (30) days from such notice, Licensor shall have the right thereafter to terminate this Agreement, by giving thirty (30) days' written notice to Licensee to that effect. Any indulgence on the part of Licensor in respect of a default by Licensee shall not be construed as a waiver of its right to proceed under this Article 13 either with respect to such default or to similar subsequent defaults, nor shall the provisions of this Paragraph 13.2 be modified in any respect by any action of the parties or by anything else other than the written concurrence of the parties hereto.

- 13.3 From and after the effective date of any termination of this Agreement pursuant to the provisions of Paragraphs 3.3, 4.6, 13.1 or 13.2 the rights, powers, privileges, licences, immunities, obligations and liabilities of the parties hereto under any of the provisions of this Agreement and each sublicence theretofore granted by Licensee pursuant to Paragraph 9.3 shall automatically terminate provided however that:
 - a) termination under any provision hereof shall not relieve Licensee of the obligation to make the full payment provided under Article
 5 in order to obtain a paid-up right and licence itself to use the Process and Licensor's Know-how;
 - b) termination under any provision of this Agreement shall not:
 - relieve Licensee or Licensor of any obligation or liability arising under this Agreement to be performed or incurred by Licensee or Licensor prior to the effective date of such termination;
 - affect in any way the rights of Licensor and/or Affiliates to use Licensee's Know-how and Patents;
 - iii) relieve either party hereto of its obligations respecting confidentiality and use under Article 9 hereof;
 - c) termination by expiry of time two (2) years from the Effective Date shall not affect the right of Licensee to use the Process and Licensor's Know-how and Patents and to grant sub-licences pursuant to and in accordance with Paragraph 9.3, and shall not affect sub-licences so granted prior to such expiry provided in each case Licensee shall theretofore have paid the total licence fee payable hereunder, nor shall such termination relieve Licensee of its obligations under Paragraphs 9.3 and 9.4 hereof;
 - d) Licensee shall, notwithstanding such termination, indemnify Licensor against all costs, losses, claims, damages and expenses suffered or incurred by Licensor by reason of any breach by a sublicensee, committed after the automatic termination of his sublicence, of the provisions regarding confidentiality and use required by Paragraph 9.3 to be included in such sublicence.
- 13.4 Upon the termination of this Agreement under any provision hereof, Licensee shall, unless the Agreement terminates by expiry of time two (2) years from the Effective Date and Licensee shall theretofore have paid the full licence fee under Article 5, return to Licensor all the Technical Documentation supplied to it by Licensor and all copies thereof in its possession and procure the return of all copies in the possession of any former sub-licensee under Paragraph 9.3.

14. FORCE MAJEURE

Any delays in or failure of performance by either party shall not constitute default or give rise to any claims for damage if and to the extent caused by circumstances beyond the reasonable control of such party, such as, but not limited to, any act of God, war, labour disputes, non-performance by suppliers, energy shortage, shortage of supplies and materials, strike, fire, flood, transportation difficulty, plant or equipment breakdown, difficulty in obtaining labour, civil commotion and/or act, policy or restriction of any government or any political sub-division or agency thereof, provided however that in no event shall any obligation to pay monies hereunder be excused. A party affected by a circumstance of force majeure shall immediately notify the other and shall also notify the other when that circumstance ceases.

15. ARBITRATION

The parties will use all reasonable endeavours to settle disputes and/or differences which may arise in connection with this Agreement by negotiation. Should it be impossible to settle any dispute or difference by means of negotiation the dispute or difference shall be finally settled under the Rules of Conciliation and Arbitration of the International Chamber of Commerce by three arbitrators appointed in accordance with the said Rules, each party to nominate one arbitrator. The two arbitrators so nominated shall appoint the third arbitrator but if they are unable to do so, the third arbitrator shall be nominated by the Court of Arbitration. The arbitration award shall be final and binding upon both parties. The law applicable to the arbitration proceedings and to the substance of the dispute or difference shall be English law, the place of arbitration shall be Zürich, Switzerland, and the proceedings shall be conducted in the English language.

16. MISCELLANEOUS

- 16.1 Appendices 1 to 3 (not attached) inclusive to this Agreement form an integral part of this Agreement.
- 16.2 Save as otherwise provided in this Agreement, the rights and licences herein granted and agreed to be granted are personal and may not be assigned or otherwise transferred by the party to whom the same are granted without the written consent of the other.
- 16.3 This Agreement supersedes all negotiations and correspondence between the parties prior to the date hereof relating to the subject matter hereof, which negotiations and correspondence shall be null and void and of no effect.

- 16.4 No amendments or additions hereto shall be valid unless made in writing in the English language and signed by duly authorised representatives of both parties.
- 16.5 This Agreement is in two (2) identical copies in the English language.

17. APPLICABLE LAW

This Agreement shall be governed by and read and construed in accordance with the Laws of England.

18. NOTICES

18.1 Any notices pertaining to this Agreement shall be in writing and shall be directed by one party to the other at its respective address. The addresses of the parties are as follows:

If to the Licensor,

England.

(For the attention of Mr. A.B.)

If to the Licensee,

Moscow.

(For the attention of Mr. C.D.)

Either party may, by written notice to the other party, change the address to which notices shall be directed.

- 18.2 All notices required or permitted to be given in writing will be considered to have been delivered when:
 - a) sent by registered airmail, or
 - b) delivered in person to a representative which the addressee previously had authorised to receive and acknowledge receipt of notices, provided the notices are properly addressed.

IN WITNESS WHEREOF, the parties hereto have caused this Agreement to be executed by their duly authorised representatives.

BY:_____

BY:_____

APPENDIX 3: Machinery and equipment required by the licensed process

INDEX

3.1 and 3.2	Tool machining equipment
3.3	Tools and fixtures
3.4	Tooling services
3.5 and 3.6	Production equipment
3.7	Quality control equipment

(This exemplifies the content of a typical appended item to a licence agreement in which great detail can be provided outside the main clauses.)

3.1 and 3.2: Tool machining equipment

Item	For purchase in
Milling Machine : Vertical milling machine minimum table movement 500 x 160mm. Vertical movement 300mm. Table size minimum 200 x 800mm.	USSR
Large Surface Grinder: Working area 500 x 300mm.	USSR
Small Surface Grinder: Working area 250 x I50mm.	USSR
Cylindrical Grinder : To grind 500mm length, 40mm diameter, 5 micron tolerance.	USSR
Drilling Machine: Chuck diameter 40mm, speed 50 to 1000 r.p.m.	USSR
Small Precision Lathe : Bed length 350mm, piece diameter 50mm, centre to bed 125mm.	USSR
Large Centre Lathe : Bed length 350mm, piece diameter 150mm, centre to bed 250mm.	USSR
Tool Grinder: To hold two 150mm diameter grinding wheels.	USSR
Precision Toolgrinder : EWAG Universal Grinding Machine model WS11, details supplied, or similar.	USSR or Europe
Spark Erosion Machine : Eurospark model 740 and 50A with attachments for electrode rotation and digital readout of table location and filter for accumulation of platinum alloy particles and attachments with special tooling.	Europe
Polishing Spindle: To hold 150mm mop, 2500 to 3000 r.p.m.	USSR
Projector (Electrode Profile Control) : Details provided of Shadomaster model SM20.	USSR or Europe

Item	For purchase in
Tapewriter for tape punching: Details to be supplied in know-how package.	Europe
Miscellaneous Benches, Hand Tools Measuring Equipment and General Toolroom Equipment	USSR
Polishing Equipment : Abrasive flow machining equipment model HL15, details supplied.	Europe
All equipment for 380v and 3 phase supply 50 Hz or 220v 50 Hz.	
Note 1 : The above equipment is specified for three sets of tooling per annum and production time of 42 hours per week.	
Note 2: Also required is use of one of the N.C. Machining Centres specified in Production Equipment 3.5.	

3.3 Tools and fixtures

No.	Estimated Production Time (Weeks)	Tools
1	4	Basic Extrusion Tool
2	8	Extrusion Die Plate
3	8	Finishing Die Plate
4	1	Ejector Plate
5	1	N.C. Location Sub Plate
6	1	Milling Fixtures
7	1	Spark Erosion Fixture
8	1	Grinding Fixture
9	1	Coning Tools and Plug Sizing Tools

Note 1

Tooling manufacture from steel stock in accordance with drawings prepared on the basis of original design drawing.

- Drawing Office: 4/6 weeks.
- Toolroom: 16 weeks.

Note 2

Items 2 and 3 cannot be made simultaneously and in consequence the total elapsed time is 16 weeks.

Note 3

Manufacture from material acceptance to finished acceptance i.e. for assembly, is typically one week provided that an uninterrupted production flow is achieved, i.e. all stages occur sequentially and no quality control rejection occurs.

Note 4

The above equipment is specified for three sets of tooling per annum and production time of 42 hours per week.

3.4 Tooling services

May be sub-contracted to tooling specialists or added to Tool Machinery Equipment lists 3.1 and 3.2.

1. Jig Borer

Work table 500 x 500mm minimum. Tool diameter 40mm maximum. Opening 300mm minimum. Tolerance +/- 0.005mm.

2. Jig Grinder

Work table 500 x 500mm minimum. Tolerance +/- 0.002mm.

3. Heat Treatment Furnace

Vacuum furnace. Box size 500 x 150 x 150mm, 1,100°C.

4. Centreless Grinder

Maximum diameter 6mm. Maximum length 500mm. Tolerance +/- 0.005mm minimum.

These four items may be purchased in the USSR.

3.5 and 3.6 Production equipment

Item	Purchase source
Extrusion Press 200 tonne special : Specification with control of movement and pressure. (Details to be revealed in know-how package).	Europe
Spark Erosion Machine : Eurospark Model 740 and 50A with attachments for electrode rotation and digital readout of table location and filter for accumulation of alloy particles and attachments with special tooling.	Europe
Heat Treatment Furnace (1,100°C max) Details to be revealed in know-how package.	USSR
Degreasing/Cleaning Unit : Similar to ICI Model 1410, details supplied.	USSR
Plate Trimmer (Guillotine): Im long, suitable for 4mm steel.	USSR
Milling Machine : Vertical milling machine minimum table movement 500 x 160mm. Vertical movement 300mm. Table size minimum 200 x 800mm.	USSR
Air Press 5 tonne : Table minimum 500 x 160mm, similar to Sharpe and Weston model PD2E, details supplied.	Europe
N.C. Machining Centres 4 off: (Details to be revealed in know-how package).	Europe
Hardness Tester: Rockwell	USSR
Hydraulic Press: Standard Russian model 63te will be adequate.	USSR
Balance : 0-5kg± 0.1g.	USSR

3.7 Quality control equipment

Europe
Europe
Europe
Europe
USSR
USSR
USSR
USSR
USSR or Europe

Example 2

Licence option agreement

This agreement is an example of an option agreement which enables a potential licensee to assess a licensing opportunity on an exclusive basis for a limited period of time. In exchange for this exclusive period the licensee pays a fee and if they choose to exercise the option then a licence agreement comes into effect, the terms of which are annexed to the option document.

Option Agreement

AGREEMENT made effective the 1st day of August 1989 by and between ________, a company organised under English law (hereinafter called 'RESEARCH'), whose registered office is situated at ________, London, United Kingdom, and _______ LTD, a company organised under the laws of the Republic of Ireland (hereinafter called 'TECH'), having a principal place of business at ______ Republic of Ireland;

WITNESSETH

- A. WHEREAS, Professor ______ and _____ (hereinafter called 'INVENTORS'), have jointly made a certain invention or discovery entitled 'Controlled Environment Chamber' (hereinafter called 'the Invention'); and
- B. WHEREAS, RESEARCH represents that the Invention has been assigned to it by a certain deed of assignment pursuant to a certain Invention Administrative Agreement between RESEARCH and Plant Biotechnology (UCC) Ltd, University College, Cork, Ireland (hereinafter called 'PLANT BIOTECHNOLOGY') under which RESEARCH accepts assignment of and administers certain inventions made by faculty members, employees of PLANT BIOTECHNOLOGY and others covered by PLANT BIOTECHNOLOGY's inventions policy; and
- C. WHEREAS, RESEARCH represents that it is the holder of certain design applications on the Invention in several countries including the United Kingdom, France, Federal Republic of Germany, the Benelux countries, Canada and United States of America, said design applications and any Registered Designs or Design Patents issuing thereon being included within the DESIGN RIGHTS, as hereinafter defined;

- WHEREAS, RESEARCH represents that it has the right, pursuant to the deed of assignment described above, to grant licences under the DESIGN RIGHTS and wishes to have the Invention utilised in the public interest; and
- E. WHEREAS, RESEARCH desires that products embodying the Invention be developed and made available to the public; and
- F. WHEREAS, TECH represents that it is engaged in the business of manufacturing and selling products in fields related to the Invention; and
- G. WHEREAS, TECH is interested in evaluating the Invention in order to determine the commercial utility and sales potential of LICENSED PRODUCTS, as hereinafter defined (Exhibit A), with the prospect of making a commitment to develop products embodying the Invention for use by or for the general public, provided that TECH is able to obtain an option to a licence under the DESIGN RIGHTS with exclusivity on reasonable terms and conditions; and
- H. WHEREAS, RESEARCH recognises that TECH requires an option to such a licence in order to justify the investment in funding and personnel needed to evaluate the Invention and the commercial prospects for LICENSED PRODUCTS; and
- I. WHEREAS, TECH desires to obtain such an option to a licence under the DESIGN RIGHTS; and
- J. WHEREAS, RESEARCH is willing to grant to TECH such an option to a licence under the DESIGN RIGHTS.

NOW, THEREFORE, in consideration of the premises and the performance of the covenants herein contained, it is agreed as follows:

I. DEFINITIONS

For the purposes of this OPTION AGREEMENT and the Licence Agreement described in ARTICLE VI hereof, and solely for those purposes, the terms defined in the Licence Agreement comprising EXHIBIT A hereof shall have the same meanings when used in this OPTION AGREEMENT. Additional terms used in this OPTION AGREEMENT shall be defined as follows: 'OPTION PERIOD' shall mean the period of time beginning with the effective date of this OPTION AGREEMENT and terminating on the thirty-first day of March 1990, or upon termination of this OPTION AGREEMENT, whichever occurs sooner.

II. RESEARCH'S OBLIGATIONS

- a) RESEARCH hereby grants to TECH and TECH hereby accepts from RESEARCH, on the terms and conditions herein set forth, a nonassignable option until the expiration of the OPTION PERIOD, unless sooner terminated as herein provided, to enter into a licence agreement ('Licence Agreement') with RESEARCH as described in ARTICLE V hereof.
- b) RESEARCH hereby grants to TECH and TECH hereby accepts from RESEARCH on the terms and conditions of this Option Agreement, a nontransferable, licence under the DESIGN RIGHTS to make, use or sell up to, but not more than, 1,000 LICENSED PRODUCTS and to sell such LICENSED PRODUCTS in the LICENSED TERRITORY for test marketing purposes during the OPTION PERIOD, but not thereafter unless TECH shall exercise its option to enter into the Licence Agreement in which event earned royalties will be payable thereunder pursuant to the terms and conditions of the Licence Agreement.

III. TECH'S OBLIGATIONS

- a) Upon execution and delivery of this OPTION AGREEMENT, TECH shall pay RESEARCH an Option Issue Fee of X Thousand Pounds Sterling (£X,000), and VAT at the standard rate shall be paid as an additional item.
- b) TECH shall exercise diligence during the OPTION PERIOD in evaluating its interest in the subject matter of this OPTION AGREEMENT including diligently proceeding to test market up to 1,000 LICENSED PRODUCTS in the LICENSED TERRITORY as set forth in ARTICLE II (b) hereof.
- c) TECH shall provide RESEARCH with a written report upon expiration or termination of the OPTION PERIOD, setting forth TECH's progress under this ARTICLE III.

IV. ROYALTIES, RECORDS AND REPORTS

a) For the rights and privileges granted under this Option Agreement, TECH shall pay to RESEARCH, in the manner provided, to the end of the term or terms of the DESIGN RIGHTS or until this Option Agreement is terminated as hereinafter provided, earned royalties in percentages of the Net Sales Value of all LICENSED PRODUCTS that are made, Used or Sold by or for TECH or AFFILIATES or SUBLICENSEES under this Option Agreement, and VAT at the standard rate shall be charged as an additional item. The percentage payable on the Net Sales Value of LICENSED PRODUCTS sold shall be determined in accordance with the following:

Number of LICENSED PRODUCTS	Percentage of Net Sales Value
Sold During the OPTION PERIOD	of LICENSED PRODUCT
0 - 100	0%
101 - 1000	3%

If the Net Sales Value of an individual unit of LICENSED PRODUCT after applicable deductions exceeds the Maximum Net Sales Value then the Net Sales Value of that individual unit will be replaced by the Maximum Net Sales Value.

b) Earned royalty shall be paid pursuant to ARTICLE IV(a) hereof on all LICENSED PRODUCTS made, Sold or Used under this Option Agreement; however, earned royalty shall be payable hereunder as to a given LICENSED PRODUCT only when a licence or an immunity granted under ARTICLE II hereof is utilised in the manufacture or Sale or Use thereof, and the earned royalty payable on a given LICENSED PRODUCT made hereunder shall not become due and owing until such LICENSED PRODUCT is Sold or Used.

Any LICENSED PRODUCT made under a licence granted pursuant to this Option Agreement prior to the termination or expiration of the applicable DESIGN RIGHTS and not Sold or Used prior to the termination or expiration of such DESIGN RIGHTS shall be subject to the payment of royalties hereunder when Sold and Used, even though such Sale or Use occurs after the termination or expiration of all pertinent licences of rights granted hereunder.

The earned royalty for any particular LICENSED PRODUCT shall be due upon the first bona fide arm's length Sale or Use thereof and any subsequent Sale or Use of such LICENSED PRODUCT by other than TECH or an AFFILIATE or a SUBLICENSEE shall be royalty free.

- c) Notwithstanding the provisions of ARTICLE IV(b) hereof, in the case of transfers or Sales of any LICENSED PRODUCT between TECH and an AFFILIATE or between AFFILIATES or between a SUBLICENSEE and its AFFILIATES or between a SUBLICENSEE's AFFILIATES, but one and only one royalty shall be payable thereon and such royalty shall become payable upon the final Sale thereof to a third party or final Use thereof by TECH or AFFILIATE or by a SUBLICENSEE or its AFFILIATE.
- d) TECH shall keep full, true and accurate books of accounts containing all particulars which may be necessary for the purpose of showing the amount payable to RESEARCH by way of royalty as aforesaid or by way of any other provision hereunder. Said books of accounts shall be kept at TECH's principal place of business. Said books and the support data shall be maintained and kept open at all reasonable times, for three (3) years following the end of the calendar year to which they pertain (and access shall not be denied thereafter, if reasonably available), to the inspection of an independent certified public accountant retained by RESEARCH and reasonably acceptable to TECH for the purpose of verifying TECH's royalty statements, or TECH's compliance in other respects with this Option Agreement. Names of customers and other confidential information shall not be disclosed to RESEARCH by such independent certified accountant. Such accountant shall be retained at RESEARCH's sole expense, unless during any such inspection a deficiency in payments to RESEARCH of ten per cent (10%) or more is determined to exist in which event TECH shall within thirty (30) days reimburse RESEARCH for the expense of retaining such accountant.
- e) TECH within thirty (30) days after the first day of January 1990 and also within thirty (30) days after the first day of April 1990 shall deliver to RESEARCH a true and accurate report, giving such particulars of the LICENSED PRODUCTS made, Used and Sold by TECH and AFFILIATES and SUBLICENSEE's during the preceding periods of four (4) months and three (3) months respectively as are pertinent to an accounting for royalty under this Licence Agreement. These shall include at least the following:
 - the quantity of LICENSED PRODUCTS billed by TECH and AFFILIATES and SUBLICENSEE's during those respective four (4) months or three (3) months and the billings therefore;
 - ii) the allowable deductions therefrom;
 - iii) the calculation of royalties thereon;

- iv) the amount of LICENSED PRODUCTS Used, Sold or otherwise disposed of during those respective four (4) months or three (3) months subject to ARTICLE IV(a) hereof;
- v) the calculation of royalties thereon; and
- vi) the total royalties so calculated.

Simultaneously with the delivery of each such report, TECH shall pay to RESEARCH the royalty and any other payments due under this Option Agreement for the period covered by such report. If no royalties are due, it shall be so reported. Royalties shall be paid to RESEARCH in Pounds Sterling at RESEARCH's office specified for the purposes of giving notice in ARTICLE VIII(b) hereof.

RESEARCH agrees to maintain information in such reports in confidence to the same extent that it maintains like information of its own in confidence, subject to RESEARCH's obligation to report information under said Invention Administration Agreement with PLANT BIOTECHNOLOGY.

V. EXERCISE OF OPTION

The option herein granted shall be exercisable by TECH by written notice to RESEARCH at any time during the OPTION PERIOD.

VI. TERMS OF LICENCE AGREEMENT

If TECH exercises its option under ARTICLE V hereof to enter into the Licence Agreement, it shall be made effective as of the date TECH exercises its option hereunder and shall be in the form of and pursuant to the terms and conditions set forth in **EXHIBIT** A hereof, whereupon the parties shall promptly, upon exercise of said option, execute, date and exchange executed originals of the Licence Agreement in the form of **EXHIBIT** A.

VII. TERMINATION

- a) This OPTION AGREEMENT may be terminated by TECH upon written notice to RESEARCH.
- b) If, upon expiration or termination of the OPTION PERIOD, or if, at any time during the OPTION PERIOD, TECH shall determine that it does not wish to enter into the Licence Agreement, it shall promptly so notify RESEARCH in writing and within thirty (30) days provide RESEARCH with a written report of TECH's evaluation of the technology covered

by the DESIGN RIGHTS. Such report shall include a summary of the experimental work conducted by TECH on LICENSED PRODUCTS prior to and during the term of the OPTION PERIOD as well as results and conclusions drawn therefrom but only to the extent that TECH is free to disclose such information to RESEARCH without violating an obligation of confidentiality to a third party. RESEARCH shall neither disclose such information to others nor use it for any commercial purpose other than in its own decision making activities without prior written consent of TECH. RESEARCH will not disclose TECH as the source of any such information obtained from it without the prior written consent of TECH.

- c) Subject to ARTICLE VIII(e) hereof, if TECH shall become bankrupt or insolvent and/or if the business of TECH shall be placed in the hands of a Receiver, Assignee, or Trustee, whether by the voluntary act of TECH or otherwise, this OPTION AGREEMENT shall immediately terminate.
- Upon expiration of the OPTION PERIOD or termination of this OPTION AGREEMENT, the parties shall have no further rights or obligations under this OPTION AGREEMENT, except as specified in ARTICLES IV, VII(b), and VIII hereof.
- e) RESEARCH shall have the right to terminate this OPTION AGREEMENT for breach or default by TECH on thirty (30) days written notice to TECH; provided, however, that TECH shall have the right to correct any such breach or default within the thirty (30) days notice period.

VIII. GENERAL

- a) This OPTION AGREEMENT, including its EXHIBIT A, constitutes the entire agreement between the parties as to the subject matter thereof, and all prior negotiations, representations, agreements and understandings are merged into, extinguished by and completely expressed by it.
- Any notice required or permitted to be given by this OPTION shall be sent by first class mail to the party concerned at the address above.
 AGREEMENT shall be given by prepaid, first class, registered post or recorded delivery addressed to the pertinent party at the address of record, as follows.

TECH LTD

Eire or RESEARCH

United Kingdom (marked for the attention of the Chief Executive)

Such addresses may be altered by notice so given.

- c) This OPTION AGREEMENT and its effect and the Licence Agreement and its effect are all subject to and shall be construed and enforced in accordance with English law, except as to any issue which by English law depends upon the validity, scope or enforceability of any Registered Design or Design Patent within the DESIGN RIGHTS, which issue shall be determined in accordance with the law of the country of such Registered Designs or Design Patents.
- d) RESEARCH and TECH shall endeavour to settle amicably any disputes arising under this OPTION AGREEMENT. If the parties are unable to settle any dispute by themselves, then any such dispute arising in connection with this OPTION AGREEMENT shall be submitted first to alternative dispute resolution proceedings and, if that fails, then such dispute shall be finally settled by arbitration conducted in England, by and in accordance with the rules then obtaining of the International Arbitration Association and Judgment upon the award rendered may be entered in the highest court of the forum, having jurisdiction. The provisions of this ARTICLE VIII (d) shall not apply to any dispute or controversy as to which any treaty or law prohibits settlement as contemplated under this ARTICLE.
- e) Nothing in this OPTION AGREEMENT shall be construed so as to require the commission of any act contrary to law, and wherever there is any conflict between any provision of this OPTION AGREEMENT or concerning the legal right of the parties to contract and any statute, law, ordinance or treaty the latter shall prevail, but in such event the affected provisions of this OPTION AGREEMENT shall be curtailed and limited only to the extent necessary to bring it within the applicable legal requirement.

- f) It shall be the full and sole responsibility of TECH to use appropriate care in the practice of any manufacture and use of any product pursuant to this OPTION AGREEMENT or to any licence or immunity granted under any Licence Agreement entered into under this OPTION AGREEMENT and RESEARCH shall have no right to control the manner in which any product is manufactured or used or the material from which any product licensed hereunder is manufactured and RESEARCH shall not be required to provide any know-how or operating instructions or other information with respect to any such product or manufacture or use of such product and RESEARCH makes no representation or warranty whatsoever with respect to any such product or manufacture or use thereof.
- g) Nothing in this OPTION AGREEMENT shall be construed as a representation or a warranty by RESEARCH as to the validity or scope of any Registered Design or Design Patent within the DESIGN RIGHTS or that any process practised or anything made, used or sold or otherwise disposed of under any licence or immunity granted under the Licence Agreement is or will be free from infringement of Registered Design or Design Patents or other patents of third parties.
- h) TECH agrees to indemnify and hold harmless INVENTORS, RESEARCH and PLANT BIOTECHNOLOGY and their respective officers, directors, employees and agents from and against any and all claims, damages and liabilities asserted by third parties, both government and private, arising from TECH's manufacture, use or sale of LICENSED PRODUCTS or the use thereof by others including the ultimate consumer.
- i) As used in this OPTION AGREEMENT, singular includes the plural and plural includes the singular, wherever so required by the context. The headings appearing at the beginning of the numbered ARTICLES hereof have been inserted for convenience only and do not constitute a part of this OPTION AGREEMENT.
- j) TECH shall not use the name of any inventor of the DESIGN RIGHTS, or of any institution with which they have been or are connected, or of RESEARCH, or any adaptation of any of them, in any advertising, promotional or sales literature, without prior written consent obtained from RESEARCH in each and every case. TECH shall require its AFFILIATES to comply with this ARTICLE VII (j) to the same extent that it applies to TECH.

 RESEARCH shall not use the name of TECH, or any adaptation thereof, in any advertising, promotional or sales literature or in any press release without prior written consent of TECH in each and every case.

IN WITNESS WHEREOF, the parties hereto have hereunto set their hands and duly executed this OPTION AGREEMENT on the date(s) indicated below, to be effective the day and year first above written.

Attest: By	By
Title:	Title:
Date:	Date:

EXHIBIT A: LICENCE AGREEMENT

AGREEMENT made effective the ______ day of ______ 1989 by and between ______, a company organised under English law (hereinafter called 'LICENSOR'), whose registered office is situated at ______, London, United Kingdom, and ______ LIMITED, a company organised under the laws of the Republic of Ireland (hereinafter called 'LICENSEE'), having a principal place of business at ______, Republic of Ireland;

WITNESSETH

- A. WHEREAS, Professor ______ and _____ (hereinafter collectively called 'INVENTORS'), have jointly made a certain invention or discovery entitled 'Controlled Environment Chamber' (hereinafter called 'the Invention'); and
- B. WHEREAS, LICENSOR represents that the Invention had been assigned to it by a certain deed of assignment pursuant to a certain Invention Administration Agreement between LICENSOR and Plant Biotechnology (UCC) Ltd, University College, Cork, Ireland (hereinafter called 'PLANT BIOTECHNOLOGY'), under which LICENSOR accepts assignment of and administers certain inventions made by faculty members, employees of PLANT BIOTECHNOLOGY and others covered by PLANT BIOTECHNOLOGY's inventions policy; and
- C. WHEREAS, LICENSOR represents that it is the holder of certain design applications on the Invention in several countries including the United Kingdom, France, Federal Republic of Germany, the Benelux countries, Canada and United States of America, said design applications and any Registered Designs or Design Patents issuing thereon being included within the DESIGN RIGHTS, as hereinafter defined; and
- WHEREAS, LICENSOR represents that it has the right pursuant to the deed of assignment described above, to grant licences under the DESIGN RIGHTS and wishes to have the Invention utilised in the public interest; and
- E. WHEREAS, LICENSOR desires that the Invention be developed and made available to the public; and
- F. WHEREAS, LICENSEE is willing to make a commitment to develop the Invention for use by and for the general public; and
- G. WHEREAS, LICENSEE represents that it is engaged in the business of manufacturing and selling products in fields related to the Invention; and

- H. WHEREAS, LICENSEE is prepared to undertake a programme for the development, manufacture and sale of LICENSED PRODUCTS, as hereinafter defined, provided that LICENSEE is able to obtain a licence under the DESIGN RIGHTS with exclusivity to protect its investment in such development; and
- I. WHEREAS, LICENSOR recognises that LICENSEE requires such a licence in order to justify the investment in funding and personnel needed to develop and market LICENSED PRODUCTS; and
- J. WHEREAS, LICENSEE desires to obtain such a licence under the DESIGN RIGHTS; and
- K. WHEREAS, LICENSOR is willing to grant to LICENSEE such a licence under the DESIGN RIGHTS.

NOW, THEREFORE, in consideration of the premises and the performance of the covenants herein contained, it is agreed as follows:

1. DEFINITIONS

For the purposes of this LICENCE AGREEMENT and of the OPTION AGREEMENT to which it is EXHIBIT A, and solely for such purposes, the terms hereinafter set forth shall have the following respective meanings:

- a) 'DESIGN RIGHTS' shall mean the design application(s) and/or Registered Design(s) or Design Patent(s) identified in SCHEDULE A hereof, together with any other application based thereon, any Registered Design or Design Patent issuing on any of said applications and any reissue or extension based upon any such Registered Design or Design Patent.
- b) The phrase 'covered by the DESIGN RIGHTS' and equivalent language as used herein shall mean covered by a valid issued, unexpired Registered Design or Design Patent within the DESIGN RIGHTS or by a pending design application within the DESIGN RIGHTS. An issued, unexpired Registered Design or Design Patent shall be presumed to be valid unless and until it has been held to be invalid by a final judgment of a court of competent jurisdiction from which no appeal can be made or is taken. For the purposes of royalty determination and payment under ARTICLE 4 hereof, any pending design application shall be deemed to be the equivalent of a valid issued, unexpired Registered Design or Design Patent and in consideration for LICENSOR's agreement to grant a licence as herein specified under any Registered Design or Design Patent issuing thereon earned royalties shall be payable in respect thereof as though it were a valid Registered Design or Design Patent.

- c) 'SUBLICENSEE' shall mean a sublicensee of LICENSEE under the DESIGN RIGHTS pursuant to ARTICLE 12 hereof.
- d) 'AFFILIATE' shall mean any company or organisation which directly or indirectly controls, is controlled by or is under common control with LICENSEE, control being the ownership of at least fifty (50%) per cent of the stock entitled to vote upon election of directors thereof.
- e) 'Sold' (or 'Sale') shall mean sold or otherwise disposed of for value.
- f) 'Used' (or 'Use') shall mean used for commercial purposes.
- g) 'Seller' shall mean one who Sells.
- h) 'LICENSED PRODUCT' shall mean any product covered by the DESIGN RIGHTS or made by a method covered by the DESIGN RIGHTS or that is Sold by LICENSEE or an AFFILIATE or a SUBLICENSEE under conditions or circumstances which, if unlicensed, would amount to infringement or contributory infringement or inducement of infringement of the DESIGN RIGHTS.
- i) 'Net Sales Value' shall mean actual billings by the Seller (LICENSEE or an AFFILIATE or a SUBLICENSEE) for sale of LICENSED PRODUCT less the following deductions where they are factually applicable:
 - i) discounts, allowed and taken, in amounts customary in the trade; and
 - ii) sales and/or use taxes and/or duties imposed upon and with specific reference to particular Sales;
 - iii) amounts allowed or credited on rejections or returns (not exceeding the original billing) or retroactive price reductions; and
 - iv) outbound transportation prepaid or allowed. No allowance or deduction shall be made for commissions or collections, by whatever name known.
- j) The Net Sales Value of any LICENSED PRODUCT that is Used by LICENSEE or an AFFILIATE or a SUBLICENSEE or Sold or otherwise disposed of by LICENSEE or an AFFILIATE or a SUBLICENSEE or any person, firm or company controlling, controlled by, or under common control with LICENSEE or an AFFILIATE or such SUBLICENSEE or enjoying a special course of dealing with LICENSEE or an AFFILIATE or such SUBLICENSEE, shall be determined for the LICENSED PRODUCT so Used, Sold or otherwise disposed of by reference to the Net Sales Value thereof which would apply under ARTICLE 1(i) hereof in an arm's length Sale to a third party other than such person, firm or corporation.

- k) 'Maximum Net Sales Value' shall mean an amount of Two Hundred Pounds Sterling (£200) for the calendar year 1989 and, for each succeeding year as of 1 January of that succeeding year, the amount of the preceding year increased by index linking with reference to the UK Producer Prices Index for Standard Industrial Classification category 3710 published by the Central Statistical Office.
- 'LICENSED TERRITORY' shall mean the Benelux countries, Canada, Federal Republic of Germany, France, United Kingdom, and United States of America.

2. LICENCE

- a) LICENSOR hereby grants and agrees to grant to LICENSEE and LICENSEE hereby accepts and agrees to accept from LICENSOR, upon the terms and conditions herein specified, an exclusive, as hereinafter specified in ARTICLE 10 hereof, and non-assignable, except as hereinafter specified, licence under the DESIGN RIGHTS to make, to have made, to Use and to Sell LICENSED PRODUCTS in the country or countries in which the DESIGN RIGHTS are or shall be in effect and in their respective territories and possessions, to the full end of the term or terms on a country-by-country basis for which the DESIGN RIGHTS are issued, unless sooner terminated as hereinafter provided.
- b) LICENSOR hereby grants and agrees to grant to LICENSEE and LICENSEE hereby accepts and agrees to accept from LICENSOR, upon the terms and conditions herein specified, the right to grant to purchasers and users of any product Sold as a LICENSED PRODUCT hereunder immunity from suit for infringement of the DESIGN RIGHTS in the use of such product.
- c) LICENSOR hereby grants and agrees to grant to LICENSEE and LICENSEE hereby accepts and agrees to accept from LICENSOR, upon the terms and conditions herein specified, the right to extend to its AFFILIATES the licence and rights grants pursuant to ARTICLES 2(a) and 2(b) hereof, provided LICENSEE promptly notifies LICENSOR in writing of each such extension.
- d) LICENSEE agrees to be responsible for the performance hereunder by its AFFILIATES to which the licence and rights shall have been extended pursuant to ARTICLE 2(c) hereof.
- e) For the purposes of reporting and making payments of earned royalties under this Licence Agreement, the manufacture, Sale or Use of LICENSED PRODUCTS by any AFFILIATE to which the licence and rights shall have been extended pursuant to ARTICLE 2(c) hereof shall be considered for manufacture, Sale or Use of such LICENSED PRODUCT by LICENSEE; however, provided LICENSEE shall so notify LICENSOR in advance thereof in writing, any such AFFILIATE may make the pertinent reports and royalty payments specified in ARTICLE 4 hereof directly to LICENSOR on behalf of LICENSEE; otherwise, such reports and payments on account of Sales or Uses of LICENSED PRODUCTS by each AFFILIATE shall be made by LICENSEE; and, in any event, the Sales and Uses of LICENSED PRODUCT by each such AFFILIATE shall be shown separately in the reports to LICENSOR if such information is readily available to LICENSEE.
- No other, further or different licence or right and, except as expressly provided in ARTICLES 2(b), 2(c) and 12 hereof, no further power to sublicence is hereby granted or implied.

3. LICENCE FEES

- a) LICENSEE shall pay to LICENSOR, within thirty (30) days following the execution and delivery of this Licence Agreement, a Licence Issue Fee of Ten Thousand Pounds Sterling (£10,000) and VAT at the standard rate, no part of which shall be creditable against any other monies payable under this Licence Agreement.
- b) Beginning with the first anniversary of the effective date of this Licence Agreement, and on each subsequent anniversary of the effective date of this Licence Agreement until the first to occur of either: (i) the first Sale of a LICENSED PRODUCT upon which earned royalties are payable hereunder or, (ii) termination of this Licence Agreement, LICENSEE shall pay LICENSOR a Licence Maintenance Fee of Five Thousand Pounds Sterling (£5,000) and VAT at the standard rate.
- c) LICENSEE may take as a credit against any monies payable as earned royalties under ARTICLE 4(a) hereof any amounts paid to LICENSOR as Licence Maintenance Fees under ARTICLE 3(b) hereof, provided, however, that no amount taken as a credit under this ARTICLE 3(c) shall be credited more than once against earned royalties payable under ARTICLE 4(a).

4. ROYALTIES, RECORDS AND REPORTS

a) For the rights and privileges granted under this Licence Agreement, LICENSEE shall pay to LICENSOR, in the manner provided, to the end of the term or terms of the DESIGN RIGHTS or until this Licence Agreement is terminated as hereinafter provided, earned royalties in the amount of three per cent (3%) of the Net Sales Value of all LICENSED PRODUCTS that are made, Used or Sold by or for LICENSEE or AFFILIATES or SUBLICENSEES under this Licence Agreement, and VAT at the standard rate shall be charged as an additional item.

If the Net Sales Value of an individual unit of LICENSED PRODUCT after applicable deductions exceeds the Maximum Net Sales Value then the Net Sales Value of that individual unit will be replaced by the Maximum Net Sales Value.

b) Earned royalty shall be paid pursuant to ARTICLE 4(a) hereof on all LICENSED PRODUCTS made, Sold or Used under this Licence Agreement; however, earned royalty shall be payable hereunder as to a given LICENSED PRODUCT only when a licence or an immunity granted under ARTICLE 2 hereof is utilised in the manufacture or Sale or Use thereof, and the earned royalty payable on a given LICENSED PRODUCT made hereunder shall not become due and owing until such LICENSED PRODUCT is Sold or Used.

Any LICENSED PRODUCT made under a licence granted pursuant to this Licence Agreement prior to the termination or expiration of the applicable DESIGN RIGHTS and not Sold or Used prior to the termination or expiration of such DESIGN RIGHTS shall be subject to the payment of royalties hereunder when Sold and Used, even though such Sale or Use occurs after the termination or expiration of all pertinent licences of rights granted hereunder.

The earned royalty for any particular LICENSED PRODUCT shall be due upon the first bona fide arm's length Sale or Use thereof and any subsequent Sale or Use of such LICENSED PRODUCT by other than LICENSEE or an AFFILIATE or a SUBLICENSEE shall be royalty free.

c) Notwithstanding the provisions of ARTICLE 4(b) hereof, in the case of transfers or Sales of any LICENSED PRODUCT between LICENSEE and an AFFILIATE or between AFFILIATES or between a SUBLICENSEE and its AFFILIATES or between a SUBLICENSEE's AFFILIATES, one and only one royalty shall be payable thereon and such royalty shall become payable upon the final Sale thereof to a third party or final Use thereof by LICENSEE or AFFILIATE or by a SUBLICENSEE or its AFFILIATE.

- d) LICENSEE shall keep full, true and accurate books of accounts containing all particulars which may be necessary for the purpose of showing the amount payable to LICENSOR by way of royalty as aforesaid or by way of any other provision hereunder. Said books of accounts shall be kept at LICENSEE's principal place of business. Said books and the support data shall be maintained and kept open at all reasonable times, for three (3) years following the end of the calendar year to which they pertain (and access shall not be denied thereafter, if reasonably available), to the inspection of an independent certified public accountant retained by LICENSOR and reasonably acceptable to LICENSEE for the purpose of verifying LICENSEE's royalty statements, or LICENSEE's compliance in other respects with this Licence Agreement. Names of customers and other confidential information shall not be disclosed to LICENSOR by such independent certified accountant. Such accountant shall be retained at LICENSOR's sole expense, unless during any such inspection a deficiency in payments to LICENSOR of ten per cent (10%) or more is determined to exist in which event LICENSEE shall within thirty (30) days reimburse LICENSOR for the expense of retaining such accountant.
- e) LICENSEE within thirty (30) days after the first day of January, April, July and October of each year shall deliver to LICENSOR a true and accurate report, giving such particulars of the LICENSED PRODUCTS made, Used and Sold by LICENSEE and AFFILIATES and SUBLICENSEE's during the preceding three (3) months as are pertinent to an accounting for royalty under this Licence Agreement. These shall include at least the following:
 - the quantity of LICENSED PRODUCTS billed by LICENSEE and AFFILIATES and SUBLICENSEES during those three (3) months and the billings therefore;
 - ii) the allowable deductions therefrom;
 - iii) the calculation of royalties thereon;
 - iv) the amount of LICENSED PRODUCTS Used, Sold or otherwise disposed of during those three (3) months subject to ARTICLE 1(j) and ARTICLE 4(a) hereof;
 - v) the calculation of royalties thereon; and
 - vi) the total royalties so calculated.

Simultaneously with the delivery of each such report, LICENSEE shall pay to LICENSOR the royalty and any other payments due under this Licence Agreement for the period covered by such report. If no royalties are due, it shall be so reported. Royalties shall be paid to LICENSOR in Pounds Sterling at LICENSOR's office specified for the purposes of giving notice in ARTICLE 13(b) hereof. LICENSOR agrees to maintain information in such reports in confidence to the same extent that it maintains like information of its own in confidence, subject to LICENSOR's obligation to report information under said Invention Administration Agreement with PLANT BIOTECHNOLOGY.

f) LICENSEE shall pay to LICENSOR Annual Minimum Royalty Payments for each Group of Countries, as identified in SCHEDULE B hereof, within the DESIGN RIGHTS in accordance with SCHEDULE B hereto attached. The Annual Minimum Royalty Payments for any Group of Countries shall be payable annually beginning with the calendar year immediately following the one in which occurs the first Sale or Use of a LICENSED PRODUCT upon which earned royalties are payable under this Licence Agreement in the respective Group of Countries as specified in SCHEDULE B hereto attached or the calendar year 1991, whichever occurs sooner, and they shall be payable for each calendar year thereafter that this Licence Agreement is in effect. The Annual Minimum Royalty Payments for each calendar year shall be paid by LICENSEE with its report to LICENSOR for the last three (3) month period of the respective calendar year.

LICENSEE shall be entitled to credit the amount of the earned royalties paid as to any given country for any calendar year against the amount of the Annual Minimum Royalty Payment payable for such calendar year as to the Group of Countries containing that country. No amount of earned royalty paid as to any Group of Countries for a given calendar year, nor any portion thereof, shall be carried over as a credit against the Annual Minimum Royalty Payment payable for any succeeding calendar year.

- g) All amounts payable hereunder by LICENSEE to LICENSOR shall be payable in Pounds Sterling. In the event any LICENSED PRODUCT shall be Sold by LICENSEE or an AFFILIATE or a SUBLICENSEE for currency other than Pounds Sterling, the earned royalty payable as to such LICENSED PRODUCT under ARTICLE 4(a) hereof shall first be determined in the currency for which the LICENSED PRODUCT was Sold and then converted into its equivalent in Pounds Sterling as follows:
 - the average rate applicable to the transfer of funds arising from royalty payments as established by the exchange control authorities of the country of which the currency of such funds is the national currency for the accounting period for which payment is thus made; or

- ii) if there is no applicable rate so established, then the average selling rate for Pounds Sterling currency as published by leading commercial banks in the major city of the country for which such foreign currency is the national currency for such accounting period; or
- iii) if there is no rate so published, then the average buying rate for such foreign currency as published by leading United Kingdom banks for such accounting period.

If the law or regulations of any country shall at any time operate to prohibit the transfer of funds therefrom to the United Kingdom, LICENSEE shall have the right to pay royalties hereunder on account of the Sales or Use in such country by depositing local currency to the account of LICENSOR in a bank in such country and notifying LICENSOR to such effect. LICENSEE shall thereafter cooperate with LICENSOR by lawful means to obtain the lawful release of said funds to LICENSOR but shall have no further responsibility therefore.

- h) LICENSOR shall upon request of LICENSEE inform LICENSEE of the issuance of all licences by it to other licensees under the DESIGN RIGHTS and shall provide LICENSEE with a copy of the royalty provisions of such licences.
- i) In the event that any payment required under this Licence Agreement shall be overdue for twenty (20) days, LICENSEE shall pay interest thereon at an annual rate of two (2%) per cent over the London InterBank seven-day rate computed from the date when the payment became due; provided, however, that if such rate shall be in excess of that allowed by applicable law, then the highest rate permitted by law shall apply.

5. DILIGENCE

LICENSEE shall exercise diligence in developing, testing, manufacturing, promoting, advertising and selling LICENSED PRODUCTS under this Licence Agreement.

- a) In the course of such diligence LICENSEE shall:
 - Diligently upon entering into this Licence Agreement, establish, conduct, and maintain a programme directed towards the development of at least one LICENSED PRODUCT to the point of marketability in each country within the DESIGN RIGHTS.
 - ii) As part of the programme referred to in clause (i) above, initiate an appropriate programme in LICENSEE's facilities or in facilities under LICENSEE's control to develop LICENSED PRODUCTS and establish such manufacturing and quality control procedures as may be necessary to meet commercial requirements for the manufacture of LICENSED PRODUCTS in one or more countries and for the Sale of LICENSED PRODUCTS in each such country.
 - Establish and conduct appropriate development programmes to determine the reliability, safety and efficiency of LICENSED PRODUCTS.
 - iv) Conduct necessary and appropriate studies to develop and/or acquire data and information required for manufacturing and marketing LICENSED PRODUCTS in all countries within the DESIGN RIGHTS to the extent that such approval is needed.
 - v) Diligently pursue the development of LICENSED PRODUCTS in all countries within the DESIGN RIGHTS.
 - vi) Manufacture, or otherwise procure, and market LICENSED PRODUCTS in all such countries promptly upon completing any necessary development work.
 - vii) Advertise, promote the Sale of and otherwise employ marketing techniques reasonably designed to develop a market demand for LICENSED PRODUCTS in each of the countries within the DESIGN RIGHTS and employ reasonable efforts to fulfil such demand.
 - viii) Do all other acts consistent with sound business judgement to practise the invention embraced by DESIGN RIGHTS.

- b) LICENSEE shall furnish LICENSOR with written semi-annual reports of its performance under ARTICLE 5(a) hereof during the preceding six (6) calendar months, said reports to be due thirty (30) days after the 1st day of January and July of each year until LICENSED PRODUCTS upon which earned royalty is payable under ARTICLE 4(a) hereof are being commercially marketed on a regular basis in the United Kingdom and in each other country within the DESIGN RIGHTS.
- c) Within one (1) year of the effective date of this Licence Agreement, LICENSEE shall provide LICENSOR with the following:
 - a written statement of LICENSEE's best estimate or forecast of its projected annual Sales in each country listed among the DESIGN RIGHTS for each of the first five (5) years of Sales of each product that it intends to market as a LICENSED PRODUCT under the Licence Agreement; and
 - a written statement of LICENSEE's forecast of the anticipated marketing dates in the United Kingdom and each other such country for each such product that it intends to market as a LICENSED PRODUCT, based upon the assumption that no unexpected technical or regulatory problems will arise.
- d) Subject to necessary generally sequential performance of the acts specified in Paragraph (a) clauses (i) through (viii) of this ARTICLE 5, each of them is separately agreed upon and performance of one of them shall not excuse non-performance of another.
- e) Non-performance of any requirements of this ARTICLE 5 shall be a breach of or default under this Licence Agreement.
- f) LICENSOR agrees to maintain information in such reports in confidence to the same extent that it maintains like information of its own in confidence, subject to LICENSOR's obligation to report information under said Invention Administration Agreement with PLANT BIOTECHNOLOGY.

6. TERMINATION

- a) Subject to Article 13(e) hereof, if LICENSEE shall become bankrupt or insolvent and/or if the business of LICENSEE shall be placed in the hands of a Receiver, Assignee, or Trustee, whether by the voluntary act of LICENSEE or otherwise, this Licence Agreement shall immediately terminate.
- b) Upon any breach of or default under this Licence Agreement by LICENSEE, LICENSOR may terminate this Licence Agreement by thirty (30) days' written notice by registered mail to LICENSEE. Said notice shall become effective at the end of the said period, unless during said period LICENSEE shall cure such breach or default.
- c) LICENSEE may terminate this Licence Agreement at any time on three(3) months' written notice to LICENSOR.
- d) Upon termination of this Licence Agreement for any reason, all rights granted hereunder shall revert to LICENSOR for the benefit of LICENSOR.
- e) LICENSEE's obligations to report to LICENSOR and to pay royalties to LICENSOR as to any LICENSED PRODUCT made, Sold or Used under a licence or an immunity granted pursuant to this Licence Agreement or as to any practice of LICENSED PROCESS prior to termination or expiration of this Licence Agreement shall survive such termination or expiration and any termination of this Licence Agreement shall be subject to this ARTICLE 6(e).
- f) Notwithstanding any other remedy provided for herein, if LICENSEE shall not make the payment of any Annual Minimum Royalty Payment provided for herein for any Group of Countries, when due, LICENSOR shall have the option, in its discretion, to terminate the licence and rights granted as to such Group of Countries under this Licence Agreement on thirty (30) days written notice to LICENSEE, whereupon the licence and rights as to such Group of Countries granted under this Licence Agreement shall be terminated unless LICENSEE shall have made such payment to LICENSOR within such thirty (30) days from the date of such notice.
- g) Upon any termination of this Licence Agreement its provisions shall continue in force and effect to the extent necessary to effect any provision which by its terms clearly shall continue beyond such termination.

7. ASSIGNMENT

This Licence Agreement shall not be assigned by LICENSEE, except as part of a sale of all or substantially all of LICENSEE's business, and, in such event, only in its entirety and upon prior written notice to LICENSOR; and, the term 'LICENSEE' where used in this Licence Agreement shall thereafter mean such assignee of LICENSEE.

8. INFRINGEMENT

- a) LICENSOR agrees to protect at its own cost and expense its Registered Designs and Design Patents within the DESIGN RIGHTS from infringement and prosecute infringers when, after consultation with LICENSEE, LICENSOR judges such action to be reasonably necessary, proper and justified.
- b) Notwithstanding the provisions of ARTICLE 8(a) above, provided LICENSEE shall have supplied LICENSOR with evidence comprising a prima facie case of infringement of the DESIGN RIGHTS by a third party hereto selling significant quantities of products in competition with LICENSEE's Sale of LICENSED PRODUCTS hereunder, LICENSEE shall be entitled to notify LICENSOR in writing requesting LICENSOR to take steps to protect the DESIGN RIGHTS and unless LICENSOR shall within three (3) months of the receipt of such written request either: (i) cause said infringement to terminate (including termination for whatever cause); or (ii) initiate legal proceedings against the infringer; or (iii) grant LICENSEE the right, at LICENSEE's sole expense, to bring suit against the infringer for infringement of the DESIGN RIGHTS; LICENSEE shall be entitled to defer one-half of all royalty thereafter becoming due to LICENSOR under ARTICLE 4(a) of this Licence Agreement on the basis of Sales by LICENSEE in the country or countries where such third party is infringing the PATENT RIGHTS in competition with LICENSEE, but only until such infringement shall terminate or LICENSOR shall have initiated such legal proceedings against the infringer or shall have granted LICENSEE the right, at LICENSEE's sole expense, to bring suit against the infringer for infringement of the DESIGN RIGHTS. For the purpose of this ARTICLE 8(b), 'significant quantities' of products shall mean such products Sold by the third party over a three (3) month period within the immediately preceding six (6) months prior to such notice having a Net Sales Value of Thirty Thousand Pounds Sterling (£30,000).

- c) In no event shall LICENSEE be entitled to invoke ARTICLE 8(b) above with respect to more then one alleged infringer in any one country listed with the DESIGN RIGHTS at any given time even though there be more then one such infringer in such country and the provisions of ARTICLE 8(b) hereof shall not come into effect or continue in effect as to such country while LICENSOR is carrying on any such legal proceeding therein.
- d) In the event either party hereto shall initiate or carry on legal proceedings to enforce the DESIGN RIGHTS against an alleged infringer, as provided herein, the other party hereto shall fully cooperate with the party initiating or carrying on such proceedings.
- e) In the event LICENSOR shall institute suit or other legal proceedings to protect or enforce the DESIGN RIGHTS, it shall have sole control of such suit.
- f) In the event LICENSEE shall institute suit or other legal proceedings under ARTICLE 8(b) above to protect or enforce the DESIGN RIGHTS, LICENSOR shall be entitled to be represented by counsel of its choosing.
- g) In the event either LICENSOR or LICENSEE shall institute suit or other legal proceedings under this ARTICLE to protect or enforce the DESIGN RIGHTS, then each party shall be entitled to retain for its own account, out of any recovery awarded as damages, an amount corresponding to its actual out-of-pocket legal expenses paid to third parties for conducting such suit or other legal proceedings and the balance shall be divided equally between the parties. LICENSEE shall not discontinue or settle any such proceedings brought by it under this ARTICLE without obtaining the concurrence of LICENSOR and giving LICENSOR a timely opportunity to continue such proceedings in its own name, under its sole control, and at its sole expense.

9. STATUS OF THE DESIGN RIGHTS

- a) LICENSOR shall diligently maintain and prosecute the design applications filed within the DESIGN RIGHTS to obtain Registered Design or Design Patents thereon. LICENSOR does not represent or warrant that any such Registered Design or Design Patent will be obtained and LICENSOR shall at its sole discretion be responsible for determining whether to abandon any or all of said design applications.
- b) LICENSOR shall be responsible for maintaining the Registered Design or Design Patents obtained on the design applications referred to in ARTICLE 9(a) hereof.
- c) Should LICENSOR in its sole discretion determine that it no longer wishes to maintain any of such Registered Design or Design Patents, or maintain or prosecute any of such design applications, LICENSOR shall notify LICENSEE in writing of such determination and afford LICENSEE the opportunity of assuming the responsibility for, and expense of, maintaining such Registered Designs or Design Patents and maintaining and prosecuting such design applications on behalf of LICENSOR.
- d) Subject to ARTICLE 9(a) hereof, nothing in this Licence Agreement shall be construed to require LICENSOR to file or prosecute any of such design applications or maintain any Registered Design or Design Patent.
- e) In the event that LICENSEE shall elect under ARTICLE 9(c) hereof to maintain any Registered Design or Design Patent or maintain and prosecute any design application, LICENSEE shall be entitled to credit its out-of-pocket expenses for such maintenance or prosecution against earned royalties payable under ARTICLE 4(a) hereof with respect to LICENSED PRODUCTS as to which such earned royalties are payable solely on the basis of the pertinent design application or Registered Design or Design Patent as to which such out-of-pocket expenses shall have been incurred by LICENSEE.
- f) Upon request by LICENSEE, LICENSOR will advise LICENSEE of the status of all design applications and Registered Designs or Design Patents within the DESIGN RIGHTS.

10. EXCLUSIVITY

Subject to ARTICLES 6(f) and 13(e) and 13(f) hereof, the licence and rights granted to LICENSEE under ARTICLE 2 hereof shall be exclusive to LICENSEE in each country within the DESIGN RIGHTS in that LICENSOR shall not grant another concurrently effective licence under the pertinent DESIGN RIGHTS, or any of them, during the period extending from the effective date of this Licence Agreement until either: (i) the end of the term or terms of the pertinent Registered Designs or Design Patents in each country within the DESIGN RIGHTS; or (ii) termination of this Licence Agreement; whichever is first to occur.

11. NON-USE OF NAMES

- a) LICENSEE shall not use the name of any inventor of the DESIGN RIGHTS, or of any institution with which they have been or are connected, or of LICENSOR, or any adaptation of any of them, in any advertising, promotional or sales literature, without prior written consent obtained from LICENSOR in each case. LICENSEE shall require its AFFILIATES and SUBLICENSEE to comply with this ARTICLE 11 to the same extent that it applies to LICENSEE.
- b) LICENSOR shall not use the name of LICENSEE, or any adaptation thereof, in any advertising, promotional or sales literature or in any press release without prior written consent of LICENSEE in each case.

12. SUBLICENSING PROVISIONS

LICENSOR hereby grants and agrees to grant to LICENSEE, and a) LICENSEE hereby accepts and agrees to accept from LICENSOR, upon the terms and conditions herein specified, a non-assignable, except with this Licence Agreement as provided in ARTICLE 7 hereof, right and power to grant to others ('SUB-LICENSEES'), only during the time and to the extent that the herein granted licence under the DESIGN RIGHTS shall be exclusive to LICENSEE under ARTICLE 10 hereof, upon reasonable terms and conditions, nonexclusive and non-assignable royalty-bearing licences under the DESIGN RIGHTS to make, to have made, to Use and to Sell LICENSED PRODUCTS in the country or countries in which the DESIGN RIGHTS are or shall be in effect and in their respective territories and possessions, to the full end of the term or terms for which the DESIGN RIGHTS are issued, unless sooner terminated as herein provided. Notwithstanding the preceding sentence and subject to ARTICLE 2(c), this ARTICLE 12(a) shall not give LICENSEE the right or power to grant a sublicence to an AFFILIATE or to any person, firm or corporations owning, controlling, owned by, controlled by, or under common control with LICENSEE and AFFILIATE, either directly or indirectly.

- b) For the sub-licensing rights and privileges granted under this Licence Agreement, LICENSEE shall pay to LICENSOR, in the manner herein provided, earned royalties pursuant to ARTICLE 4(a) hereof on all LICENSED PRODUCTS made, Used or Sold by each SUB-LICENSEE hereunder.
- c) LICENSEE shall include among the books of account specified in ARTICLE 4(d) hereof such particulars as may be necessary for the purpose of showing the amounts of royalty payable to LICENSOR on account of the activities of SUB-LICENSEE's hereunder, and LICENSEE shall require each SUB-LICENSEE to keep appropriate books of accounts to enable LICENSEE to comply with this ARTICLE 12(c).
- d) LICENSEE shall include in the reports specified in ARTICLES 4(e) hereof the same information on SUB-LICENSEE's business activities as is required of LICENSEE's business activities, separately stated as to each SUB-LICENSEE, and LICENSEE shall require each SUB-LICENSEE to make appropriate reports to LICENSEE to enable LICENSEE to comply with this ARTICLE 12(d).
- e) LICENSEE shall pay to LICENSOR with each such report all royalties and other payments due hereunder on account of SUB-LICENSEES activities for the period covered by such report. If no royalties are due, it shall be so reported.
- f) The requirements of ARTICLE 11 hereof shall apply to SUB-LICENSEES and LICENSEE shall require its SUB-LICENSEES to comply therewith with the same extent that LICENSEE is required to do so.
- g) LICENSEE shall notify LICENSOR of the issuance of all sub-licences hereunder, each such sublicence shall be in writing and each sublicensing agreement hereunder shall include appropriate termination provisions essentially like those of ARTICLE 6 hereof and general provisions essentially like those of ARTICLE 13 hereof, and within thirty (30) days of the execution thereof LICENSEE shall provide LICENSOR with a copy of each sublicensing agreement entered into pursuant hereto.
- h) LICENSEE shall neither grant a sublicence under this Licence Agreement nor refuse to sublicence under this Licence Agreement under any circumstances or condition amounting to a misuse of any patent within the DESIGN RIGHTS.

- i) Any sub-licence in effect at the termination of this Licence Agreement shall remain in effect, but for the benefit of LICENSOR, provided SUB-LICENSEE shall continue to make all reports and payments due and owing under its sublicence agreement and is not otherwise in breach or default thereunder, such reports and payment then to be made to LICENSOR rather than LICENSEE, and provided further that LICENSEE shall thereupon promptly assign each such sublicence agreement to LICENSOR without further consideration.
- j) In the event that a SUB-LICENSEE shall at any time become an AFFILIATE or at any time become the owner or controller by LICENSEE or become owned by or controlled by or under common control with LICENSEE, either directly or indirectly, such SUB-LICENSEE shall thereafter be regarded as an AFFILIATE for purposes of royalty determination and payment hereunder.

13. GENERAL

- a) This Licence Agreement constitutes the entire agreement between the parties as to the DESIGN RIGHTS, and all prior negotiations, representations, agreements and understandings are merged into, extinguished by and completely expressed by it.
- b) Any notice required and permitted to be given by this Licence Agreement shall be given by prepaid, first class, registered post or recorded delivery addressed to:

(marked for the attention of the Chief Executive)

Such addresses may be altered by notice so given. If no time limit is specified for a notice required or permitted to be given by this Licence Agreement, the time limit therefore shall be ten (10) full business days, not including the day of mailing.

c) This Licence Agreement and its effect are subject to and shall be construed and enforced in accordance with English law, except as to any issue which by English law depends upon the validity, scope or enforceability of any Registered Design or Design Patent within the DESIGN RIGHTS, which issue shall be determined in accordance with the applicable design laws of the country of such Registered Design or Design Patent.

- d) LICENSOR and LICENSEE shall endeavour to settle amicably any disputes arising under this Licence Agreement. If the parties are unable to settle any dispute by themselves, then any such dispute arising in connection with this Licence Agreement shall be submitted first to alternative dispute resolution proceedings and, if that fails, then such dispute shall be finally settled by arbitration conducted in London, England, by and in accordance with the rules then obtaining of the International Arbitration Association and judgment upon the award rendered may be entered in the highest court of the forum having jurisdiction. The provisions of this ARTICLE 13(d) shall not apply to any dispute or controversy as to which any treaty or law prohibits settlement as contemplated under this ARTICLE.
- e) Nothing in this Licence Agreement shall be construed so as to require the commission of any act contrary to law, and wherever there is any conflict between any provision of this Licence Agreement or concerning the legal right of the parties to contract and any statute, law, ordinance or treaty, the latter shall prevail, but in such event the affected provisions of this Licence Agreement shall be curtailed and limited only to the extent necessary to bring it within the applicable legal requirement.
- f) Notwithstanding anything to the contrary in this Licence Agreement, nothing herein contained shall be construed as a representation by LICENSOR that the DESIGN RIGHTS can be or will be used to prevent the importation by a third party hereto of a product into or the sale or use by a third party hereto of a product in any country within the DESIGN RIGHTS where such product shall have been placed in commerce under circumstances which preclude the use of the DESIGN RIGHTS to prevent the importation or sale or use by reason of any applicable law or treaty.
- g) LICENSEE shall take all reasonable and necessary steps to register this Licence Agreement in any country where such is required to permit the transfer of funds and/or payment of royalties to LICENSOR hereunder or is otherwise required by the government or law of such country to effectuate or carry out this Licence Agreement. Notwithstanding anything contained herein, but subject to ARTICLE 13(e) hereof, LICENSEE shall not be relieved of any of its obligations under this Licence Agreement by any failure to register this Licence Agreement in any country, and specifically, LICENSEE shall not be relieved of its obligation to make any payment due to LICENSOR hereunder at LICENSOR's address specified in ARTICLE 13(b) hereof, where such payment is blocked due to failure to register this Licence Agreement.

- h) It shall be the full and sole responsibility of LICENSEE and its AFFILIATES and SUB-LICENSEES to use appropriate care in the practice of any manufacture and use of any product pursuant to any licence or immunity granted hereunder and LICENSOR shall have no right to control the manner in which any product is manufactured or used or the material from which any product licensed hereunder is manufactured and LICENSOR shall not be required to provide any knowhow or operating instructions or other information with respect to any such product or manufacture or use of such product and LICENSOR makes no representation or warranty whatsoever with respect to any such product or manufacture or use thereof.
- i) Nothing in this Licence Agreement shall be construed as a representation or a warranty by LICENSOR as to the validity or scope of any Registered Design or Design Patent within the DESIGN RIGHTS or that any process practised or anything made, used or sold, or otherwise disposed of under any licence or immunity granted under this Licence Agreement is or will be free from infringement of Registered Designs or Design Patents or other patents of third parties.
- j) LICENSEE agrees to indemnify and hold harmless INVENTORS, LICENSOR, PLANT BIOTECHNOLOGY and their respective offices, directors, employees and agents from and against any and all claims, damages and liabilities asserted by third parties, both government and private, arising from LICENSEE's and AFFILIATE's and SUB-LICENSEE's practice of LICENSED PROCESS or manufacture, use or sale of LICENSED PRODUCTS or the use thereof by others including ultimate consumers.
- k) As used in this Licence Agreement, singular includes the plural and plural includes the singular, wherever so required by the context. The headings appearing at the beginning of the numbered ARTICLES hereof have been inserted for convenience only and do not constitute a part of this Licence Agreement.

14. EFFECTIVE DATE AND TERM

This Licence Agreement shall become effective on the day and year first above written and shall, unless terminated earlier by one of the parties in accord with its terms, expire concurrently with the expiration, invalidation or lapsing of all issued Registered Designs or Design Patents within the DESIGN RIGHTS and/or the abandonment of all pending design applications within the DESIGN RIGHTS.

15. THIS LICENCE AGREEMENT INCORPORATES AN OPTION AGREEMENT

This Licence Agreement incorporates by reference a certain OPTION AGREEMENT between the parties relating to the DESIGN RIGHTS made effective the First day of August 1989.

IN WITNESS WHEREOF, the parties hereto have hereunto set their hands and duly executed this Licence Agreement on the date(s) indicated below, to be effective the day and the year first above written.

Attest: (note: this is done by relevant authorised parties)

SCHEDULE A

REGISTERED DESIGN AND DESIGN PATENT APPLICATIONS

Country	Number	Filing Date
United Kingdom	1,036,781	18 December 1986
France	871508	17 March 1987
Federal Republic of Germany	MR 27 770 Registered on:	18 September 1986 17 March 1987
Canada	59537 Registered on:	26 February 1987 20 October 1987
United States	008,921	30 January 1987
Benelux Countries	64525-01/02	13 July 1989

SCHEDULE B

Schedule of Annual Minimum Royalty Payments

Calendar year from effective date	Minimum Payment due by Country Group		
	Α	В	
1			
2			
3			
4			
And succeeding years			

 II
 Group A
 Country name

 Group B
 Country name

III. LICENSOR and LICENSEE shall confer in order to negotiate the amounts to be specified in Paragraph I of this Schedule B as Annual Minimum Royalty Payments, such amounts to be based upon a reasonable estimate of the anticipated sales volume for the sale of LICENSED PRODUCTS by LICENSEE (including AFFILIATES) during future years, taking into account LICENSEE's best estimate of such sales volume, for which estimates are to be provided to LICENSOR by LICENSEE upon notice to LICENSOR that LICENSEE exercises the option to enter into this Licence Agreement pursuant to the OPTION AGREEMENT. In the event the parties are unable to agree on the amounts to be specified in Paragraph I, either party may submit this matter to arbitration at any time following sixty (60) days from the first day of January of the calendar year during which the first Annual Minimum Royalty Payment becomes payable under this Licence Agreement.

Example 3

Licence agreement with provision for sub-licensing to various partners in a multinational consortium

INDEX to clauses (provided in view of length of document)

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LICENCE AGREEMENT

AGREEMENT made effective the 26th day of February 1990, by and between PQR LTD, a company organised under the laws of England (hereinafter called 'LICENSOR'), having a principal office at ______, and XYZ PLC, a company organised under the laws of England (hereinafter called 'LICENSEE') having a principal place of business at _____.

WITNESSETH

- B. WHEREAS, LICENSOR represents that the invention has been assigned to it by a certain deed of assignment pursuant to a certain Invention Administration Agreement between LICENSOR and the UNIVERSITY OF OXBRIDGE (hereinafter called 'UNIVERSITY'), under which LICENSOR accepts assignment and administers certain inventions made by faculty members, employees of UNIVERSITY and others covered by UNIVERSITY's patent policy; and
- C. WHEREAS, LICENSOR represents that it is the beneficial owner of certain patent applications and patents on the Invention in several Countries by virtue of a Patent Cooperation Treaty application said patent applications and any patents issuing thereon being included within the PATENT RIGHTS, as hereinafter defined; and
- D. WHEREAS, LICENSOR represents that it has the right, pursuant to the deed of assignment described above, to grant non-exclusive licences under the PATENT RIGHTS and wishes to have the Invention utilised in the public interest; and
- E. WHEREAS, LICENSOR desires that the Invention be developed and made available to the public; and
- F. WHEREAS, LICENSEE is willing to make a commitment to contribute to the development of the invention for use by and for the general public; and
- G. WHEREAS, LICENSEE represents that it is engaged in the business of manufacturing and selling products in fields related to the Invention and has considerable experience in the development and marketing of such products; and
- H. WHEREAS, LICENSEE is prepared to undertake a programme for the development of LICENSED PRODUCTS, as hereinafter defined, provided

that LICENSEE is able to obtain a non-exclusive licence under the PATENT RIGHTS with a right to sub-licence; and

- I. WHEREAS, LICENSOR recognises that LICENSEE requires such a licence in order to develop LICENSED PRODUCTS; and
- J. WHEREAS, LICENSEE desires to obtain such a licence under the PATENT RIGHTS; and
- K. WHEREAS, LICENSOR is willing to grant to LICENSEE such a licence under the PATENT RIGHTS.

NOW THEREFORE, in consideration of the premises and the performance of the covenant herein contained, IT IS agreed as follows:

1. DEFINITIONS

For the purposes of this LICENCE AGREEMENT and solely for such purposes, the terms hereinafter set forth shall have the following respective meanings:

- a) 'PATENT RIGHTS' shall mean the patent application(s) and/or patent(s) identified in SCHEDULE A hereof (and in respect of Patent Cooperation Treaty applications, European Patent Convention applications or applications under similar administrative international conventions, patent applications in the listed or designated countries), together with any divisional, continuation, continuation-in-part, substitution or other application based thereon, any patent issuing on any of said applications and any reissue or extension based upon any such patent.
- b) i) The phrase 'covered by the PATENT RIGHTS' and equivalent language as used herein shall mean covered by a valid claim of an issued, unexpired patent within the PATENT RIGHTS or by a claim being prosecuted in a pending application within the PATENT RIGHTS.
 - A claim of an issued, unexpired patent shall be presumed to be valid unless and until it has been held to be invalid by a final judgment of a court of competent jurisdiction from which no appeal can be or is taken.
 - iii) Any claim being prosecuted in a pending patent application shall be deemed to be the equivalent of a valid claim, of an issued, unexpired patent. This is in consideration for LICENSOR's agreement to grant a licence as herein specified under any patent issuing thereon.
- c) 'SUB-LICENSEE' shall mean a sub-licensee or LICENSEE under the PATENT RIGHTS pursuant to ARTICLE 4 hereof.

- d) 'CONTRACTOR' shall mean one of the companies or institutions identified in SCHEDULE B hereof.
- e) 'AFFILIATED COMPANY' shall mean any company directly or indirectly controlled by LICENSEE as of the date of signature of, and 'control' shall be as defined in Annex 4 (not attached).
- f) 'LICENSEE' shall mean LICENSEE and any AFFILIATED COMPANY thereof.
- g) 'Sold' (or 'Sale', 'Sell', etc.) shall mean sold, leased or otherwise disposed of.
- h) 'Used' (or 'Use') shall mean for commercial purposes.
- i) 'LICENSED PRODUCT' shall mean any product which is covered by the PATENT RIGHTS, or that is Sold by LICENSEE or a SUB-LICENSEE under conditions or circumstances which, if unlicensed, would amount to infringement or contributory infringement or inducement of infringement of the PATENT RIGHTS.
- j) 'EFFECTIVE DATE' shall mean the date at the head of this Licence Agreement.

2. LICENCE

LICENSOR hereby grants and agrees to grant to LICENSEE and LICENSEE hereby accepts and agrees to accept from LICENSOR, upon the terms and conditions herein specified:

- a) A non-exclusive, as hereinafter specified in ARTICLE 9 hereof, royaltyfree, and non-assignable, except as hereinafter specified, licence under the PATENT RIGHTS to make, to have made, to Use and to Sell or otherwise dispose of LICENSED PRODUCTS for use in the country or countries in which the PATENT RIGHTS are or shall be in effect and in their respective territories and possessions, to the full end of the term or terms on a country-by-country basis for which the PATENT RIGHTS are issued, unless sooner terminated as hereinafter provided.
- b) The right to grant to purchasers and users of any product Sold as a LICENSED PRODUCT hereunder immunity from suit for infringement of the PATENT RIGHTS in use of such product.
- c) The right and obligation to grant sub-licences under the PATENT RIGHTS to one or more of the CONTRACTORS, as expressly provided in ARTICLE 4.
- No other, further or different licence or right and, except as expressly provided in ARTICLE 2(c) and 4, no further power to sublicence is granted or implied.

3. LICENCE FEES AND ROYALTIES

- a) LICENSEE shall pay to LICENSOR, within thirty (30) days following the execution of this Licence Agreement, a Licence Issue Fee of ________
 Sterling (________), which shall include payment in respect of sales of LICENSED PRODUCTS prior to the EFFECTIVE DATE, if any, and no part of which shall be creditable or refundable.
- b) Any and all use, sales and other disposals of LICENSED PRODUCTS that are made, Used or Sold by or for LICENSEE or SUB-LICENSEES under this Licence Agreement shall be royalty-free.

4. SUB-LICENSING PROVISIONS

- a) For the rights and privileges granted under this Licence Agreement, LICENSEE undertakes to grant a sub-licence under all of the PATENT rights only to each of the CONTRACTORS in accordance with the terms set out in either SCHEDULE C or SCHEDULE D hereof as appropriate.
- b) LICENSEE shall use all reasonable endeavours to negotiate and execute sub-licences with each CONTRACTOR, and in any event shall issue for signature a sublicence as set out in SCHEDULE C or SCHEDULE D hereof to each CONTRACTOR, with the exception of any CONTRACTOR which declines in writing an opportunity to secure a sublicence from LICENSEE ('declination'), within six months of the EFFECTIVE DATE, and furthermore LICENSEE shall, within thirty days of the last day of each of the first three consecutive six monthly periods following the EFFECTIVE DATE, provide LICENSOR with a report detailing progress made to date with sublicensing, together with details, if any, of declinations made by the CONTRACTORS.
- c) LICENSEE shall notify LICENSOR of the issuance of all sub-licences hereunder, and within thirty (30) days of the execution thereof LICENSEE shall provide LICENSOR with a copy of each sub-licensing agreement entered into pursuant hereto.
- d) Any sub-licence in effect at the termination of this Licence Agreement shall remain in effect but for the benefit of LICENSOR, provided SUB-LICENSEE is not otherwise in breach default thereunder, and LICENSEE shall thereupon promptly assign each such sublicence agreement to LICENSOR without further consideration.

e) LICENSEE shall at all times be responsible for the observance and performance by each SUB-LICENSEE of the terms and conditions of the sublicence and shall be directly liable to LICENSOR for any breach, non-observance or non-performance by any SUB-LICENSEE of any terms and conditions imposed pursuant to this Licensing Agreement as if such breach, non-observance or non-performance had been that of LICENSEE.

5. TERMINATION

- a) If LICENSEE shall become bankrupt or insolvent and/or if the business of LICENSEE shall be placed in the hands of a Receiver, Assignee, or Trustee, whether by the voluntary act of LICENSEE or otherwise, LICENSEE shall immediately notify LICENSOR in writing, and LICENSOR may, at its discretion, terminate this Licence Agreement forthwith by giving notice in writing.
- b) Upon any breach of or default under this Licence Agreement by LICENSEE, LICENSOR may terminate this Licence Agreement by thirty (30) days written notice by registered mail to LICENSEE. Said notice shall become effective at the end of said period, unless during said period LICENSEE shall cure such breach or default.
- c) Upon termination of this Licence Agreement for any reason, all rights granted hereunder shall revert to LICENSOR for the benefit of LICENSOR.
- d) Upon any termination of this Licence Agreement its provisions shall continue in force and effect to the extent necessary to effectuate any provision which by its terms clearly shall continue beyond such termination.

6. ASSIGNMENT

This Licence Agreement shall not be assigned by LICENSOR except as part of a sale of all or substantially all of LICENSEE's business, or that part of the LICENSEE's business in which the PATENT RIGHTS are utilised, and, in such event, only in its entirety and upon prior written notice to LICENSOR and, the term 'LICENSEE' where used in this Licence Agreement shall thereafter mean such assignee of LICENSEE.

7. INFRINGEMENT

- a) LICENSEE shall advise LICENSOR of any infringement of the PATENT RIGHTS of which it is aware.
- b) If at any time a third party shall infringe a patent licensed to LICENSEE under this Licence Agreement in any country, then (1) LICENSOR may obtain a discontinuance of such infringing operations; (2) LICENSOR at its option, may bring suit at its own expense; or (3) if LICENSOR declines to bring suit at its own expense, LICENSEE may bring suit in accordance with ARTICLE 7(d) at LICENSEE'S expense against such infringer and LICENSOR shall take such action as is legally necessary to assist LICENSEE in such action.
- c) If LICENSOR elects to bring suit, LICENSOR shall control the prosecution thereof, and LICENSEE shall be entitled to be represented in such suit by counsel of its own selection at its own expense. In such case any recoveries received shall be applied to reimburse LICENSOR.
- d) If LICENSEE brings suit as provided in ARTICLE 7(b), LICENSEE shall control the prosecution thereof. In such case, any recoveries received shall first be applied to reimburse LICENSEE for litigation costs and the balance, if any, shall be shared by LICENSEE receiving eighty five per cent (85%) and LICENSOR receiving fifteen per cent (15%) of such balance. LICENSEE shall give careful consideration to the views of LICENSOR in making its decision whether or not to sue, and LICENSOR shall be entitled to be represented in such suit by counsel of its own choice at its own expense.

8. STATUS OF THE PATENT RIGHTS

- a) LICENSOR shall diligently maintain and prosecute the patent applications filed within the PATENT RIGHTS. LICENSOR does not represent or claim that any patent will be obtained and subject to ARTICLE 8(d) thereof, LICENSOR shall in its sole discretion be responsible for determining whether to abandon any or all of said patent applications.
- b) LICENSOR shall be responsible for maintaining the patents obtained on the patent applications referred to in ARTICLE 8(a) hereof, and subject to ARTICLE 8(d) hereof. LICENSOR shall in its sole discretion be responsible for determining whether to abandon any or all of the patents obtained on the said patent applications.

- c) Upon request by LICENSEE, LICENSOR will advise LICENSEE of the status of all patent applications and patents within the PATENT RIGHTS.
- d) LICENSOR shall not abandon or allow to lapse any of the PATENT RIGHTS without notifying the LICENSEE in writing, and giving LICENSEE an opportunity to request, within 30 days of receipt of such notice, that the PATENT RIGHTS shall be maintained in the name of the LICENSOR at the expense of the LICENSEE.

9. EXCLUSIVITY

- a) Subject to ARTICLES 11(e) and 11(f) hereof, the licence and rights granted to LICENSEE under ARTICLE 2 hereof shall be non-exclusive to LICENSEE in each country within the PATENT RIGHTS, and LICENSEE acknowledges that LICENSOR shall at any time grant other concurrently effective non-exclusive licences for LICENSED PRODUCTS under the pertinent PATENT RIGHTS.
- b) LICENSOR shall not exercise against LICENSEE, or SUB-LICENSEE, any intellectual property rights anywhere in the world in respect of a LICENSED PRODUCT and furthermore LICENSOR undertakes not to issue a licence under the PATENT RIGHTS to any CONTRACTOR.
- c) LICENSOR shall not exercise against any direct or indirect customer of LICENSEE or SUB-LICENSEE any intellectual property rights anywhere in the world in respect of any LICENSED PRODUCT obtained from LICENSEE or any SUB-LICENSEE.

10. NON-USE OF NAMES

- a) LICENSEE shall not use the name of any inventor of the PATENT RIGHTS, or of any institution with which said inventor has been or is connected, or of LICENSOR, or any adaptation of any of them, in any advertising, promotional or sales literature, without prior written consent obtained from LICENSOR in each case, such consent not to be unreasonably withheld.
- b) LICENSOR shall not use the name of LICENSEE, or any SUB-LICENSEE or any adaptation thereof, in any advertising, promotional or sales literature or in any press release without prior written consent of LICENSEE or SUB-LICENSEE in each case, such consent not to be unreasonably withheld.

11. GENERAL

- a) This Licence Agreement constitutes the entire agreement between the parties as to the PATENT RIGHTS, and all prior negotiations, representations, agreements and understandings are merged into, extinguished by and completely expressed by it.
- Any notice required or permitted to be given by this Licence Agreement shall be given by postpaid, first class, registered or certified mail addressed to:

Marked for the attention of the Company Secretary or

Marked for the attention of the Chief Executive

Such addresses may be altered by notice so given. If no time limit is specified for a notice required or permitted to be given by this Licence Agreement, the time limit therefore shall be ten (10) full business days, not including the day of mailing.

- c) This Licence Agreement and its effect are subject to and shall be construed and enforced in accordance with the law of England, except as to any issue which by the law of England depends upon the validity, scope or enforceability of any patent within the PATENT RIGHTS, which issue shall be determined in accordance with the applicable patent laws of the country of such patent.
- d) LICENSOR and LICENSEE shall endeavour amicably to settle any disputes arising under this Licence Agreement. If the parties are unable to settle any dispute by themselves, then such dispute shall be finally settled by arbitration conducted in England, by and in accordance with the rules then obtaining of the London Court of Arbitration and judgment upon the award rendered may be entered in the highest court of the forum, having jurisdiction. The provisions of this ARTICLE 11(d) shall not apply to any dispute or controversy as to which any treaty or law prohibits settlement as contemplated under this ARTICLE.
- e) Nothing in this Licence Agreement shall be construed so as to require the commission of any act contrary to law, and wherever there is any conflict between any provision of this Licence Agreement or concerning the legal right of the parties to contract and any statute, law, ordinance or treaty, the latter shall prevail, but in any event the affected provisions

of this Licence Agreement shall be curtailed and limited only to the extent necessary to keep it within the applicable legal requirements.

- f) Notwithstanding anything to the contrary in this Licence Agreement, nothing herein contained shall be construed as a representation by LICENSOR that the PATENT RIGHTS can be or will be used to prevent the importation by a third party hereto of a product into or the sale or use by a third party hereto of a product in any country within the PATENT RIGHTS where such product shall have been placed in commerce under circumstances which preclude the use of the PATENT RIGHTS to prevent such importation or sale or use by reason of any applicable law or treaty.
- g) It shall be the full and sole responsibility of LICENSEE and SUB-LICENSEES to use appropriate care in the practice of any manufacture and use of any product pursuant to any licence or immunity granted hereunder and LICENSOR shall have no right to control the manner in which any product is manufactured or used or the material from which any product licensed hereunder is manufactured and LICENSOR shall not be required to provide any know-how or operating instructions or other information with respect to any such product or manufacture or use of such product, and LICENSOR makes no representation or warranty whatsoever with respect to any such product or manufacture or use thereof.
- h) Nothing in this Licence Agreement shall be construed as a representation or a warranty by LICENSOR as to the validity or scope of any patent within the PATENT RIGHTS or that any product made, Used or Sold or otherwise disposed of under any licence or immunity granted under this Licence Agreement or any process for manufacture thereof is or will be free from infringement of patents of third parties.
- i) LICENSEE agrees to indemnify and hold harmless LICENSOR and its officers, directors, employees and clients from and against any and all claims, damages and liabilities asserted by third parties, both government and private, arising from LICENSEE's Use or Sale of LICENSED PRODUCTS other than where specific claims against the LICENSOR arise from an allegation that the LICENSEE's or SUB-LICENSEE's Use or Sale of LICENSED PRODUCTS infringes the patent rights of a third party.
- j) As used in this Licence Agreement, singular includes the plural and plural includes the singular, wherever so required by the context. The headings appearing at the beginning of the numbered ARTICLES hereof have been inserted for convenience only and do not constitute a part of this Licence Agreement.

12. EFFECTIVE DATE AND TERM

This Licence Agreement shall become effective on the day and year first above written and shall, unless terminated earlier by one of the parties in accord with its terms, expire concurrently with the expiration, invalidation or lapsing of the last of the issued patents within the PATENT RIGHTS and/or the abandonment of the last of the pending patent applications within the PATENT RIGHTS.

13. GOVERNMENT RIGHTS

- a) LICENSEE shall comply in all respects with the applicable provisions of any applicable law, requirements, regulation or determination by any Government relating to the PATENT RIGHTS and shall provide LICENSOR with any information or report required to comply with any such law, requirement, regulation or determination.
- b) Any agreement or arrangement relating to the PATENT RIGHTS between LICENSEE and any third party hereto shall be made expressly subject to the terms and conditions of this ARTICLE 13 and LICENSEE shall require such other party to comply therewith to the same extent that LICENSEE is required to comply.
- c) Any licence or other right granted or to be granted pursuant to this Licence Agreement shall be subject to any and all applicable governmental laws and regulations relating to compulsory licensing.

IN WITNESS WHEREOF, the parties hereto have hereunto set their hands and duly executed this Licence Agreement on the date(s) indicated below, to be effective the day and year first above written.

(For and on Behalf of)
By:	
Date:	

SCHEDULE A

1. A Data Processing Device

- a) UK Patent Application 8521672 Filed: 30 August 1985
- b) PCT Application PCT/GB86/00514 Filed: 29 August 1985

Designating:

• USA and JAPAN

and, under the European Patent Convention:

- AUSTRIA
- SWEDEN
- LUXEMBOURG
- THE NETHERLANDS
- WEST GERMANY
- BELGIUM
- SWITZERLAND
- ITALY
- FRANCE
- GREAT BRITAIN

SCHEDULE B

SUB-LICENCE AGREEMENT

AGREEMENT made effective the		day of	,
1994, by and between a company	organised un	der the laws	of England
(hereinafter called), having	a principal
place of business at	and		_a company
organised under the laws of		(herein	after called
'CONTRACTOR'), having a principal	place of busine	ss at	·

WITNESSETH

- A. WHEREAS ________ (hereinafter called 'INVENTORS'), have made a certain invention or discovery entitled 'A Data Processing Device' (hereinafter called 'the Invention'); and
- B. WHEREAS _______ (hereinafter called ________) having a principal office at ________ is the beneficial owner of certain patent applications and patents on the Invention in several Countries by virtue of a Patent Cooperation Treaty application PCT/ / , said patent applications and any patents issuing thereon being included within the PATENT RIGHTS, as hereinafter defined; and
- C. WHEREAS ______ and ______ have entered into an agreement dated ______ (hereinafter called 'THE PRINCIPAL AGREEMENT') by virtue of which _____ grants to ______ the right to grant non-exclusive sub-licences under the PATENT RIGHTS to certain named parties; and
- D. WHEREAS CONTRACTOR is one of the named parties in THE PRINCIPAL AGREEMENT and desires to obtain such a sublicence under the PATENT RIGHTS.

NOW THEREFORE, in consideration of the premises and the performance of the covenants herein contained, it is agreed as follows:

1. **DEFINITIONS**

For the purposes of this SUB-LICENCE AGREEMENT and solely for such purposes, the terms hereinafter set forth shall have the following respective meanings:

- a) 'PATENT RIGHTS' shall mean the patent application(s) and/or patent(s) identified in SCHEDULE 1 hereof (and in respect of Patent Cooperation Treaty applications, European Patent Convention applications or applications under similar administrative international conventions, patent applications in the listed or designated countries), together with any divisional, continuation, continuation-in-part, substitution or other application based thereon, any patent issuing on any of said applications and any reissue or extension based upon any such patent.
- b) i) The phrase 'covered by the PATENT RIGHTS' and equivalent language as used herein shall mean covered by a valid claim (of an issued, unexpired patent within the PATENT RIGHTS) or by a claim being prosecuted in a pending application within the PATENT RIGHTS.
 - A claim of an issued, unexpired patent shall be presumed to be valid unless and until it has been held to be invalid by a final judgment of a court of competent jurisdiction from which no appeal can be or is taken.
 - iii) Any claim being prosecuted in a pending patent application shall be deemed to be the equivalent of a valid claim of an issued, unexpired patent.
- c) 'AFFILIATED COMPANY' shall mean any company directly or indirectly controlled by CONTRACTOR, or under the same control as CONTRACTOR, as of the date of signature of contract, and 'control' shall be as defined in Annex 4 of contract.
- d) 'SUB-LICENSEE' shall mean CONTRACTOR and any AFFILIATED COMPANY thereof.
- e) 'Sold' (or 'Sale', 'Sell', etc.) shall mean sold, leased or otherwise disposed of.
- f) 'Used (or 'Use') shall mean for commercial purposes.

- g) 'LICENSED PRODUCT' shall mean any product which is covered by the PATENT RIGHTS, or that is Sold by SUB-LICENSEE under conditions or circumstances which, if unlicensed, would amount to infringement or contributory infringement or inducement of infringement of the PATENT RIGHTS.
- h) 'EFFECTIVE DATE' shall mean the date at the head of this Sub-licence Agreement.

2. LICENCE

______hereby grants and agrees to grant to SUB-LICENSEE and SUB-LICENSEE hereby accepts and agrees to accept from ______, upon the terms and conditions herein specified:

- a) A non-exclusive, as hereinafter specified in ARTICLE 8 hereof, royaltyfree, and non-assignable, except as hereinafter specified, sub-licence under the PATENT RIGHTS to make, to have made, to Use and to Sell or otherwise dispose of LICENSED PRODUCTS for use in the country or countries in which the PATENT RIGHTS are or shall be in effect and in their respective territories and possessions, to the full end of the term or terms on a country-by-country basis for which the PATENT RIGHTS are issued, unless sooner terminated as hereinafter provided.
- b) The right to grant to purchasers and users of any product Sold as a LICENSED PRODUCT hereunder immunity from suit for infringement of the PATENT RIGHTS in use of such product.
- c) No other, further or different sub-licence or right and no power to sublicence is granted or implied.

3. SUB-LICENCE FEES AND ROYALTIES

- a) SUB-LICENSEE shall pay to ______, within thirty (30) days following the execution of this Sublicence Agreement, a Sublicence Issue Fee of ______ which shall include payment in respect of sales of LICENSED PRODUCTS prior to the EFFECTIVE DATE, if any, and no part of which shall be creditable or refundable.
- b) Any and all use, sales and other disposals of LICENSED PRODUCTS that are made, Used or Sold by or for SUB-LICENSEE under this Sublicence Agreement shall be royalty-free.

4. TERMINATION

- a) If SUB-LICENSEE shall become bankrupt or insolvent and/or if the business of SUB-LICENSEE shall be placed in the hands of a Receiver, Assignee, or Trustee, whether by the voluntary act of SUBLICENSEE or otherwise, SUB-LICENSEE shall immediately notify LICENSEE and LICENSOR in writing, and either may, at its discretion, terminate this Sub-licence Agreement forthwith by giving notice in writing.
- b) Upon any breach of or default under this Sub-licence Agreement by SUB-LICENSEE, _____ may terminate this Sub-licence Agreement by thirty (30) days written notice by registered mail to SUB-LICENSEE. Said notice shall become effective at the end of said period, unless during said period SUB-LICENSEE shall cure such breach or default.
- c) Upon termination of this Sub-licence Agreement for any reason, all rights granted hereunder shall revert to ______ for the benefit of
- d) Upon any termination of this Sub-licence Agreement its provisions shall continue in force and effect to the extent necessary to effectuate any provision which by its terms clearly shall continue beyond such termination.
- e) Upon any termination of THE PRINCIPAL AGREEMENT, this Sub-licence Agreement shall remain in effect, but for the benefit of LICENSOR, provided SUB-LICENSEE is not otherwise in breach or default thereunder.

5. ASSIGNMENT

This Sub-licence Agreement shall not be assigned by SUB-LICENSEE, except as part of a sale of all or substantially all of SUB-LICENSEE's business, or that part of the SUB-LICENSEE'S business in which the PATENT RIGHTS are utilised, and, in such event, only in its entirety and upon prior written notice to ______ and ______; and, the term 'SUB-LICENSEE' where used in this Sub-licence Agreement shall thereafter mean such assignee of SUB-LICENSEE.

6. INFRINGEMENT

SUB-LICENSEE shall advise ______ of any infringement of the PATENT RIGHTS of which it is aware, but solely to the extent that such notification does not represent a conflict of interest for the SUB-LICENSEE, and ______ of such infringement activity.

7. STATUS OF THE PATENT RIGHTS

- a) _____, to the extent that it is able to do so, shall prevail upon ______ to maintain and prosecute the patent applications filed within the PATENT RIGHTS to obtain patents thereon. ______ does not represent or warrant that any patent will be obtained.
- b) _____, to the extent that it is able to do so, shall prevail upon ______ to maintain the patents obtained on the patent applications referred to in ARTICLE 7(a) hereof.
- c) Upon request by SUB-LICENSEE, ______ will advise SUB-LICENSEE of the status of all patent applications and patents within the PATENT RIGHTS.

8. EXCLUSIVITY

- a) Subject to ARTICLES 10(e) and 10(f) hereof, the sub-licence and rights granted to SUB-LICENSEE under ARTICLE 2 thereof shall be non-exclusive to SUB-LICENSEE in each country within the PATENT RIGHTS, and SUB-LICENSEE acknowledges that ______ shall at any time grant other concurrently effective non-exclusive sub-licences for LICENSED PRODUCTS under the pertinent PATENT RIGHTS to other named parties in THE PRINCIPAL AGREEMENT.
- c) ______ shall not, and shall procure (at the cost of the SUB-LICENSEE) that ______ shall not exercise against any direct or indirect customer of SUB-LICENSEE any intellectual property rights anywhere in the world in respect of any LICENSED PRODUCT obtained from SUB-LICENSEE.

9. NON-USE OF NAMES

- a) SUB-LICENSEE shall not use the name of any inventor of the PATENT RIGHTS, or of any institution with which said inventor has been or is connected, or of ______, or of ______, or any adaptation of any of them, in any advertising, promotional or sales literature, without prior written consent obtained from ______ and ______ in each case, such consent not to be unreasonably withheld.
- b) ______ shall not use the name of SUB-LICENSEE, or any adaptation thereof, in any advertising, promotional or sales literature or in any press release without prior written consent of SUB-LICENSEE in each case, such consent not to be unreasonably withheld.
10. GENERAL

- a) This Sub-licence Agreement constitutes the entire agreement between the Parties as to the PATENT RIGHTS, and all prior negotiations, representations, agreements and understandings are merged into, extinguished by and completely expressed by it.
- b) Any notice required or permitted to be given by this Sub-licence Agreement shall be given by postpaid, first class, registered or certified mail addressed to:

Marked for the attention of the Company Secretary or

Such addresses may be altered by notice so given. If no time limit is specified for a notice required or permitted to be given by this Sublicence Agreement, the time limit therefore shall be ten (10) full business days, not including the day of mailing.

- c) This Sub-licence Agreement and its effect are subject to and shall be construed and enforced in accordance with the law of England, except as to any issue which by the law of England depends upon the validity, scope or enforceability of any patent within the PATENT RIGHTS, which issue shall be determined in accordance with the applicable patent laws of the country of such patent.
- d) ______ and SUB-LICENSEE shall endeavour amicably to settle any disputes arising under this Sub-licence Agreement. If the parties are unable to settle any dispute by themselves, then such dispute shall be finally settled by arbitration conducted in England, by and in accordance with the rules then obtaining of the London Court of Arbitration and judgment upon the award rendered may be entered in the high court of the forum having jurisdiction. The provisions of this ARTICLE 10(d) shall not apply to any dispute or controversy as to which any treaty or law prohibits settlement as contemplated under this ARTICLE.
- e) Nothing in this Sub-licence Agreement shall be construed so as to require the commission of any act contrary to law, and wherever there is any conflict between any provision of this Sub-licence Agreement or concerning the legal right of the parties to contract and any statute, law, ordinance or treaty, the latter shall prevail, but in such event the affected provisions of this Sub-licence Agreement shall be curtailed and limited only to the extent necessary to bring it within the applicable legal requirements.

- f) Notwithstanding anything to the contrary in this Sub-licence Agreement, nothing herein contained shall be construed as a representation by _______ that the PATENT RIGHTS can be or will be used to prevent the importation by a third party hereto of a product into or the sale or use by a third party hereto of a product in any country within the PATENT RIGHTS where such product shall have been placed in commerce under circumstances which preclude the use of the PATENT RIGHTS to prevent such importation or sale or use by reason of any applicable law or treaty.
- g) It shall be the full and sole responsibility of SUB-LICENSEE to use appropriate care in the practice of any manufacture and use of any product pursuant to any licence or immunity granted hereunder and _______ shall have no right to control the manner in which any product is manufactured or used or the material from which any product licensed hereunder is manufactured and _______ shall not be required under this Sub-licence Agreement to provide any know-how or operating instructions or other information with respect to any such product or manufacture or use of such product and make no representation or warranty whatsoever with respect to any such product or manufacture or use thereof.
- h) Nothing in this Sub-licence Agreement shall be construed as a representation or a warranty by ______ or _____ as to the validity or scope of any patent within the PATENT RIGHTS or that any product made, Used or Sold or otherwise disposed of under any licence or immunity granted under this Sub-licence Agreement or any process for manufacture thereof is or will be free from infringement of patents of third parties.
- i) SUB-LICENSEE agrees to indemnify and hold harmless and ______ and its officers, directors, employees and agents from and against any and all claims, damages and liabilities asserted by third parties, both government and private, arising from SUB-LICENSEE's Use or Sale of LICENSED PRODUCTS other than where such claims against _______ or ______ arise from an allegation that SUB-LICENSEE's Use or Sale of LICENSED PRODUCTS infringes the patent rights of a third party.
- j) As used in this Sub-licence Agreement, singular includes the plural and plural includes the singular, wherever so required by the context. The headings appearing at the beginning of the numbered ARTICLES hereof have been inserted for convenience only and do not constitute a part of this Sub-licence Agreement.

11. EFFECTIVE DATE AND TERM

This Sub-licence Agreement shall become effective on the day and year first above written and shall, unless terminated earlier by one of the parties in accord with its terms, expire concurrently with the expiration, invalidation or lapsing of the last of the issued patents within the PATENT RIGHTS and/or the abandonment of the last of the pending patent applications within the PATENT RIGHTS.

12. GOVERNMENT RIGHTS

- a) SUB-LICENSEE shall comply in all respects with the applicable provisions of any applicable law, requirements, regulation or determination by any Government relating to the PATENT RIGHTS and shall provide ______ with any information or report required to comply with any such law, requirements, regulation or determination.
- b) Any licence or other rights granted or to be granted pursuant to this Sub-licence Agreement shall be subject to any and all applicable governmental laws and regulations relating to compulsory licensing.

IN WITNESS WHEREOF, the parties hereto have hereunto set their hands and duly executed this Licence Agreement on the date(s) indicated below, to be effective the day and year first above written.

For and on Behalf of:	
By:	
Date:	
For and on Behalf of:	
For and on Behalf of: By:	

Filed: 30 August 1985

SCHEDULE C

1. A Data Processing Device

- a) UK Patent Application 8521672
- b) PCT Application PCT/GB86/00514 Filed: 29 August 1986

Designating:

• USA and JAPAN

and, under the European Patent Convention:

- AUSTRIA
- SWEDEN
- LUXEMBOURG
- THE NETHERLANDS
- GERMANY
- BELGIUM
- SWITZERLAND
- ITALY
- FRANCE
- GREAT BRITAIN

SCHEDULE D

SUB-LICENCE AGREEMENT

AGREEMENT made effective	ve the day of, 199, by
and between and	a company organised under the laws of
England (hereinafter called), having a principal place
of business at	and THE SECRETARY OF STATE
FOR DEFENCE (hereinafter called 'The	e SECRETARY'), as represented by the
Principal Directorate of Patents MOD (I	PE).

WITNESSETH

A.	WHEREAS (hereinafter
	called 'INVENTORS'), have made a certain invention or discovery
	entitled '' (hereinafter called 'the Invention'); and
B.	WHEREAS (hereinafter
	called '') having a principal office at
	is the beneficial owner of certain patent
	applications and patents on the Invention in several Countries by virtue
	of a Patent Cooperation PCT/GE / , said patent applications and
	any patents issuing thereon being included within the PATENT RIGHTS,
	as hereinafter declined; and
C.	WHEREAS and
	have entered into an Agreement dated
	(hereinafter called 'THE PRINCIPAL
	AGREEMENT') by virtue of which grants to

licences under the PATENT RIGHTS to certain named parties; and . WHEREAS The SECRETARY is one of the named parties in THE

_____ the right to grant non-exclusive sub-

D. WHEREAS The SECRETARY is one of the named parties in THE PRINCIPAL AGREEMENT and desires to obtain such a sub-licence under the PATENT RIGHTS.

NOW THEREFORE, in consideration of the premises and the performance of the covenants herein contained, it is agreed as follows:

1. DEFINITIONS

For the purposes of this SUB-LICENCE AGREEMENT and solely for such purposes, the terms hereinafter set forth shall have the following respective meanings:

- a) 'PATENT RIGHTS' shall mean the patent application(s) and/or patent(s) identified in SCHEDULE 1 hereof (and in respect of Patent Cooperation Treaty applications, European Patent Convention applications or applications under similar administrative international conventions, patent applications in the listed or designated countries), together with any divisional, continuation, continuation-in-part, substitution or other application based thereon, any patent issuing on any of said applications and any reissue or extension based upon any such patent.
- b) i) The phrase 'covered by the PATENT RIGHTS' and equivalent language as used herein shall mean covered by a valid claim of an issued, unexpired patent within the PATENT RIGHTS or by a claim being prosecuted in a pending application within the PATENT RIGHTS.
 - A claim of an issued, unexpired patent shall be presumed to be valid unless and until it has been held to be invalid by a final judgment of a court of competent jurisdiction from which no appeal can be or is taken.
 - Any claim being prosecuted in a pending patent application shall be deemed to be the equivalent of a valid claim of an issued, unexpired patent.
- c) 'Sold' (or 'Sale', 'Sell', etc.) shall mean sold or otherwise disposed of.
- d) 'Used' (or 'Use') shall mean for crown purposes.
- e) 'LICENSED PRODUCT' shall mean any product which is covered by the PATENT RIGHTS.
- f) 'EFFECTIVE DATE' shall mean the date at the head of this Sub-licence Agreement.

2. LICENCE

______hereby grants and agrees to grant to The SECRETARY and The SECRETARY hereby accepts and agrees to accept from ______, upon the terms and conditions herein specified:

- a) A non-exclusive, as hereinafter specified in ARTICLE 8 hereof, royaltyfree, and non-assignable, except as hereinafter specified, sublicence under the PATENT RIGHTS to make, to have made, to Use and to Sell or otherwise dispose of LICENSED PRODUCTS, to the full end of the term or terms on a country-by-country basis for which the PATENT RIGHTS are issued unless sooner terminated as hereinafter provided.
- b) No other, further or different sub-licence or right and no power to sublicence is granted or implied except as implied by placing Defcon 15 of the SECRETARY's standard contract conditions upon contracts for the feasibility study, research and development of a LICENSED PRODUCT.

3. SUB-LICENCE FEES AND ROYALTIES

- a) The SECRETARY shall pay to _____, within thirty (30) days following the execution of this Sublicence Agreement, a Sub-licence Issue Fee of _____ no part of which shall be creditable or refundable.
- Any and all acquisitions, use, Sales and other distribution of LICENSED PRODUCTS that are made, Used or Sold by or for the SECRETARY under this Sublicence Agreement shall be royalty-free.

4. TERMINATION

- a) Upon any breach of or default under this Sub-licence Agreement by The SECRETARY, _____ may terminate this sub-licence Agreement by thirty (30) days written notice by registered mail to The SECRETARY. Said notice shall become effective at the end of said period, unless during said period The SECRETARY shall cure such breach or default.
- b) Upon termination of this Sub-licence Agreement for any reason, all rights granted hereunder shall revert to ______ for the benefit of ______.

- c) Upon any termination of this Sub-licence Agreement its provisions shall continue in force and effect to the extent necessary to effectuate any provision which by its terms clearly shall continue beyond such termination.
- Upon any termination of THE PRINCIPAL AGREEMENT, this Sub-licence Agreement shall remain in effect, but for the benefit of _______, provided The SECRETARY is not otherwise in breach or default thereunder.

5. ASSIGNMENT

This Sub-licence Agreement shall not be assigned by The SECRETARY, except in the course of privatisation or devolution of operations formerly conducted by him, and, in such event, only in its entirety and upon prior written notice to ______ and _____; and, the term 'The SECRETARY' where used in this Sub-licence Agreement shall thereafter mean such assignee of The SECRETARY.

6. INFRINGEMENT

a) The SECRETARY shall advise ______ of any infringement of the PATENT RIGHTS of which it is aware, and shall in turn notify _______ of such infringement activity.

7. STATUS OF THE PATENT RIGHTS

- a) ______, to the extent that it is able to do so, shall prevail upon _______to maintain and prosecute the patent applications filed within the PATENT RIGHTS to obtain patents thereon. ______ does not represent or warrant that any patent will be obtained.
- b) _____, to the extent that it is able to do so, shall prevail upon ______ to maintain the patents obtained on the patent applications referred to in ARTICLE 7(a) hereof.
- c) Upon request by The SECRETARY, ______will advise the SECRETARY of the status of all patent applications and patents within the PATENT RIGHTS.

8. EXCLUSIVITY

- a) Subject to ARTICLES 10(e) and 10(f) hereof, the sub-licence and rights granted to The SECRETARY under ARTICLE 2 hereof shall be non-exclusive to The SECRETARY in each country within the PATENT RIGHTS, and The SECRETARY acknowledges that it shall at any time grant other concurrently effective non-exclusive sub-licences for LICENSED PRODUCTS under the pertinent PATENT RIGHTS to other named parties in THE PRINCIPAL AGREEMENT.
- b) ______ shall not exercise against The SECRETARY any intellectual property rights anywhere in the world in respect of a LICENSED PRODUCT.

9. NON-USE OF NAMES

- a) The SECRETARY shall not use the name of any inventor of the PATENT RIGHTS, or of any institution with which said inventor has been or is connected, or of ______ or of ______ or any adaptation of any of them, in any advertising, promotional or sales literature, without prior written consent obtained from ______ and _____ in each case, such consent not to be unreasonably withheld.
- b) ______ shall not use the name of The SECRETARY, or any adaptation thereof, in any advertising, promotional or in any press release without prior written consent of The SECRETARY in each case, such consent not to be unreasonably withheld.

10. GENERAL

- a) This Sub-licence Agreement constitutes the entire agreement between the parties as to the PATENT RIGHTS, and all prior negotiations, representations, agreements and understandings are merged into, extinguished by and completely expressed by it.
- b) Any notice required or permitted to be given by this Sub-licence Agreement shall be given by postpaid, first class, registered or certified mail addressed to:

Marked for the attention of the Company Secretary or

The principal director of patents

Such addresses may be altered by notice so given. If no time limit is specified for a notice required or permitted to be given by this Sublicence Agreement, the time limit therefore shall be one calendar month, not including the day of mailing.

- c) This Sub-licence Agreement and its effect are subject to and shall be construed and enforced in accordance with the law of England, except as to any issue which by the law of England depends upon the validity, scope or enforceability of any patent within the PATENT RIGHTS, which issue shall be determined in accordance with the applicable patent laws of the country of such patent.
- d) ______ and The SECRETARY shall endeavour amicably to settle any disputes arising under this Sub-licence Agreement. If the parties are unable to settle any dispute by themselves, then such dispute shall be finally settled by arbitration conducted in England, by and in accordance with the rules then obtaining of the London Court of Arbitration and judgment upon the award rendered may be entered in the highest court of the forum, having jurisdiction. The provisions of this ARTICLE 10(d) shall not apply to any dispute or controversy as to which any treaty or law prohibits settlement as contemplated under this ARTICLE.
- e) Nothing in this Sub-licence Agreement shall be construed so as to require the commission of any act contrary to law, and wherever there is any conflict between any provision of this Sublicence Agreement or concerning the legal right of the parties to contract and any statute, law, ordinance or treaty, the latter shall prevail, but in such event the affected provisions of this Sublicence Agreement shall be curtailed and limited only to the extent necessary to bring it within the applicable legal requirements.
- f) Notwithstanding anything to the contrary in this Sub-licence Agreement, nothing herein contained shall be construed as a representation by _______ that the PATENT RIGHTS can be or will be used to prevent the importation by a third party hereto of a product or the sale or use by a third party hereto of a product in any country within the PATENT RIGHTS where such product shall have been placed in commerce under circumstances which preclude the use of the PATENT RIGHTS to prevent such importation or sale or use by reason of any applicable law or treaty.

any product is manufactured or used or the material from which any product licensed hereunder is manufactured and _____

shall not be required under this Sub-licence Agreement to provide any know-how or operating instructions or other information with respect to any such product or manufacture or use of such product, and ______ makes no representation or warranty whatsoever with respect to any such product or manufacture or use thereof.

- h) Nothing in this Sub-licence Agreement shall be construed as a representation or a warranty by ______ or _____ or _____ as to the validity or scope of any patent within the PATENT RIGHTS or that any product made, Used or Sold or otherwise disposed of under any licence or immunity granted under this Sub-licence Agreement or any process for manufacture thereof is or will be free from infringement of patents of third parties.
- i) The SECRETARY agrees to indemnify and hold harmless and ______ and its officers, directors, employees and agents from and against any and all claims, damages and liabilities asserted by third parties, both government and private, arising from The SECRETARY's acquisition, Use or Sale of LICENSED PRODUCTS.
- j) As used in this Sub-licence Agreement, singular includes the plural and plural includes the singular, wherever so required by the context. The headings appearing at the beginning of the numbered ARTICLES hereof have been inserted for convenience only and do not constitute a part of this Sublicence Agreement.

11. EFFECTIVE DATE AND TERM

This Sub-licence Agreement shall become effective on the day and year first above written and shall, unless terminated earlier by one of the parties in accord with its terms, expire concurrently with the expiration, invalidation or lapsing of the last of the issued patents within the PATENT RIGHTS and/or the abandonment of the last of the pending patent applications within the PATENT RIGHTS.

IN WITNESS WHEREOF, the parties hereto have hereunto set their hands and duly executed this Sublicence Agreement on the date(s) indicated below, to be effective the day and year first above written.

(For and on Behalf of The SECRETARY OF STATE FOR DEFENCE)

By: ______
Date: _____

(For and on Behalf of)
By:	

Date:_____

Example 4

Patent licence agreement

This an example of a patent licence agreement involving patent assignment by an academic institution to a third party (Licensor) with the contractual obligation to exploit commercially the patent rights for the benefit of the institution and the Licensor and the grant of licence under the assigned rights to a USA company (Licensee) as a means of meeting the prior contractual obligation to exploit the intellectual property rights.

A licence agreement between ABC Ltd and XYZ Corp

ARTICLE	HEADING
1	DEFINITIONS
2	LICENCE
3	PAYMENT, RECORDS AND REPORTS
4	DILIGENCE
5	TERMINATION
6	ASSIGNMENT
7	INFRINGEMENT
8	STATUS OF THE PATENT RIGHTS
9	EXCLUSIVITY
10	NON-USE OF NAMES
11	GENERAL
12	EFFECTIVE DATE AND TERM
13	EXTENSION OF PATENT RIGHTS
14	GOVERNMENT RIGHTS
15	OPTION

INDEX

LICENCE AGREEMENT made effective the 18th day of July 1988 by and between **ABC LTD**, a company organised under the laws of England, (hereinafter called 'LICENSOR') having a principal office at ______

and **XYZ INC**, a company organised under the laws of ______, (hereinafter called 'LICENSEE'), having a place of business at ______.

WITNESSETH

- A. WHEREAS, _______ and ______(hereinafter called 'INVENTORS') have made certain inventions or discoveries entitled '______' (hereinafter called 'the Inventions') and
- B. WHEREAS, LICENSOR represents that the inventions have been assigned to it by certain deeds of assignment pursuant to (a) certain Invention Administration Agreements between LICENSOR and ______University (hereinafter called 'UNIVERSITY') under which LICENSOR accepts assignment of and administers certain inventions made by faculty members, employees of UNIVERSITY and others covered by UNIVERSITY's patent policy and to b) certain Invention Administration Agreements between LICENSOR and ______ (hereinafter called COUNCIL) under which LICENSOR accepts assignment of and administers certain Inventions made by employees of COUNCIL and others covered by COUNCIL's patent policy and
- C. WHEREAS, LICENSOR represents that it is the holder of UK patent applications ________ and _______, said _______, said _______, patent applications, any corresponding applications in other countries filed or to be filed and any patents issuing thereon being included within the PATENT RIGHTS, as hereinafter defined; and
- D. WHEREAS, LICENSOR represents that it has the right, pursuant to the deeds of assignment described above, to grant licences under the PATENT RIGHTS and wishes to have the inventions utilised in the public interest; and
- E. WHEREAS, LICENSOR desires that the Inventions be developed and made available to the public; and
- F. WHEREAS, LICENSOR is willing to make a commitment to develop the Invention for use by and for the general public: and

- G. WHEREAS, LICENSEE represents that it is engaged in the business of manufacturing and selling products in fields related to the Inventions and has considerable experience in the development and marketing of such products; and
- H. WHEREAS, LICENSEE is prepared to undertake a programme for the development, manufacture and sale of LICENSED PRODUCTS, as hereinafter defined, provided that LICENSEE is able to obtain a licence under the PATENT RIGHTS with exclusivity to protect its investment in such development; and
- I. WHEREAS, LICENSOR recognises that LICENSEE requires such a licence in order to justify the investment in funding and personnel needed to develop and market LICENSED PRODUCTS; and
- J. WHEREAS, LICENSEE desires to obtain such a licence under the PATENT RIGHTS; and
- K. WHEREAS, LICENSOR is willing to grant to LICENSEE such a licence under the PATENT RIGHTS.

NOW THEREFORE, in consideration of the premises and the performance of the covenants herein contained, it is agreed as follows:

1. DEFINITIONS

For the purposes of this LICENCE AGREEMENT and solely for such purposes the terms hereinafter set forth shall have the following respective meanings:

- a) 'PATENT RIGHTS' shall mean the patent applications and/or patents identified in SCHEDULE A hereof (and in respect of Patent Cooperation Treaty applications, European Patent Convention applications or applications under similar administrative international conventions, patent applications in the listed or designated countries), together with any divisional, continuation, continuation-in-part, substitution or other application based thereon, any patent issuing on any of said applications and any reissue or extension based upon any such patent.
- b) i) The phrase 'covered by the PATENT RIGHTS' and equivalent language as used herein shall mean covered by a valid claim of an issued, unexpired patent within the PATENT RIGHTS or by a claim being prosecuted in a pending application within the PATENT RIGHTS.
 - A claim of an issued, unexpired patent shall be presumed to be valid unless and until it has been held to be invalid by a fine judgment of a court of competent jurisdiction from which no appeal can be or is taken.

- iii) For the purposes of royalty determination and payment under ARTICLE 3 hereof, any claim being prosecuted in a pending patent application shall be deemed to be the equivalent of a valid claim of an issued, unexpired patent. This is in consideration for LICENSOR'S agreement to grant a licence as herein specified under any patent issuing thereon.
- c) 'SUB-LICENSEE' shall mean a sub-licensee of LICENSEE under the PATENT RIGHTS.
- d) 'AFFILIATE' shall mean any corporation or organisation which directly or indirectly controls, is controlled by or is under common control with LICENSEE, control being the ownership of at least thirty (30%) per cent of the stock entitled to vote upon election of directors thereof.
- e) 'SOLD' (or 'SALE') shall mean sold or otherwise disposed of for value.
- f) 'USED' (or 'USE') shall mean for commercial purposes.
- g) 'SELLER' shall mean one who Sells.
- h) 'LICENSED PRODUCT' shall mean any product that is covered by the PATENT RIGHTS or made by a method covered by the PATENT RIGHTS including a LICENSED METHOD including those products identified in SCHEDULE C hereof or that is Sold by LICENSEE or an AFFILIATE or a SUB-LICENSEE under conditions or circumstances which if unlicensed would amount to infringement or contributory infringement or inducement of infringement of the PATENT RIGHTS.
- i) 'LICENSED METHOD' shall mean a method as claimed in the PATENT RIGHTS and practised by LICENSEE or an AFFILIATE or a SUB-LICENSEE under conditions or circumstances which, if unlicensed, would amount to infringement or contributory infringement or inducement of infringement of the PATENT RIGHTS.
- j) 'NET SALES VALUE' shall mean actual billings by the Seller (LICENSEE or an AFFILIATE or a SUB-LICENSEE) for Sale of LICENSED PRODUCT less the following deductions where they are factually applicable:
 - i) discounts, allowed and taken, in amounts customary in the trade;
 - sales and/or use taxes and duties imposed upon and with specific reference to particular sales;
 - amounts allowed or credited on rejections or returns (not exceeding the original billing) or retroactive price reductions;
 - iv) outbound transportation prepaid or allowed; and
 - v) reasonable insurance.

No allowance or deduction shall be made for commissions or collections, by whatever name known.

- k) The Net Sales Value of any LICENSED PRODUCT that is used by LICENSEE or an AFFILIATE or a SUB-LICENSEE or Sold or otherwise disposed of by LICENSEE or an AFFILIATE or a SUB-LICENSEE or any person, firm or corporation controlling, controlled by, or under common control with LICENSEE or an AFFILIATE or such SUB-LICENSEE or enjoying a special course of dealing with LICENSEE or an AFFILIATE or such SUB-LICENSEE, shall be determined for the LICENSED PATENT so Used, Sold or otherwise disposed of by reference to the Net Sales Value thereof which would apply under ARTICLE 1(j) hereof in an arm's length Sale to a third party other than such person, firm or corporation.
- 1) 'LICENSED FIELD' shall mean the field of research and use of reagents in research other than in KIT FORM.
- m) 'DATE' or 'EFFECTIVE DATE' shall mean the date at the head of this Licence Agreement.
- n) 'KIT FORM' shall mean assemblies in the form of LICENSED PRODUCTS in measured amounts together with specified amounts of associated materials which assembly is suitable for use by the ultimate consumer without further processes.
- o) 'RADIOACTIVE LABELLED COMPOUND' shall mean any LICENSED PRODUCT which is a 'phosphothioate' containing at least one radioactive atom in the structure.
- p) The 'TERRITORY' shall mean UK, France, West Germany, Italy, the United States of America, Belgium, The Netherlands, Spain and Japan.

2. LICENCE

LICENSOR hereby grants to LICENSEE and LICENSOR hereby accepts from LICENSOR, upon the terms and conditions herein specified:

- a) A non-exclusive and non-assignable, except as hereinafter specified, licence under the PATENT RIGHTS to import, to make, to have made, to Use, to Sell and to Sell for Use LICENSED PRODUCTS for Use in the LICENSED FIELD in the country or countries of the TERRITORY in which the PATENT RIGHTS are or shall be in effect and in their respective territories and possessions, to the full end of the term or terms on a country-by-country basis for which the PATENT RIGHTS are issued, unless sooner terminated as hereinafter provided.
- b) An exclusive and non-assignable, except as hereinafter specified, licence, with right to sub-licence under the PATENT RIGHTS for fifteen (15) years from the date of this Licence Agreement to import, to make, to have made, to Use, to Sell and to Sell for Use RADIOACTIVE LABELLED COMPOUNDS.

- c) During the life of this Agreement and so long as LICENSEE is not in default with respect to any payment due to LICENSOR hereunder.
 - LICENSOR will not assert any patent or patent application licensed hereunder to prevent purchasers and users from importing, using or selling any quantity of LICENSED PRODUCT which is subject to fee hereunder and
 - ii) LICENSOR will not assert any other patent or patent application now or hereafter controlled (in the sense of having the right to grant licences or sub-licences) by LICENSOR corresponding in subject matter to any patent or patent application licensed hereunder to prevent LICENSEE, its SUB-LICENSEES, its AFFILIATES, purchasers and users from importing, using or selling any LICENSED PRODUCT which is subject to fee hereunder.
- d) The right to extend to its AFFILIATES the licence and rights granted pursuant to ARTICLES 2(a) and 2(b) hereof and to sub-licence said AFFILIATES, provided LICENSEE promptly notifies LICENSOR in writing of each such extension or sub-licence.
- e) LICENSEE agrees to be responsible for the performance hereunder by its AFFILIATES or SUB-LICENSEES to which the licence and rights shall have been extended pursuant to ARTICLE 2(b) or 2(d).
- f) i) For the purposes of reporting and making payments of earned royalties under this Licence Agreement, the manufacture, Sale or Use of LICENSED PRODUCTS by any AFFILIATE or SUB-LICENSEE to which the licence and rights shall have been extended pursuant to ARTICLE 2(a) or 2(d) hereof shall be considered the manufacture, Sale and Use of such LICENSED PRODUCTS by LICENSEE.
 - ii) However, provided LICENSEE shall so notify LICENSOR in advance thereof in writing, any such AFFILIATE or SUB-LICENSEE may make the pertinent reports and royalty payments specified in ARTICLE 3 hereof directly to LICENSOR on behalf of LICENSEE; otherwise, such reports and payments on account of Sales or Uses of LICENSED PRODUCTS by each AFFILIATE or SUB-LICENSEE shall be made by LICENSEE.
 - iii) In any event, the Sales and Uses of LICENSED PRODUCT by each such AFFILIATE or SUB-LICENSEE shall be separately shown in the reports to LICENSOR if such information is readily available to LICENSEE.
- g) No other, further or different licence or right and, except as expressly provided in ARTICLE 2(b) or 2(d) no further power to sub-licence is granted or implied.

3. PAYMENTS, RECORDS AND REPORTS

- a) LICENCE ISSUANCE FEE: LICENSEE shall pay to LICENSOR a Licence Issuance Fee of Twelve Thousand Pounds Sterling (£12,000) within the first thirty (30) days after the effective date of this Agreement. This fee shall not be claimable against any other monies payable under this Licence Agreement.
- b) MAINTENANCE FEE: LICENSEE shall pay to LICENSOR a Maintenance Fee of Two Thousand Five Hundred Pounds Sterling (£2,500) within the first thirty (30) days of each calendar year beginning the year 1990 until the first to occur of:
 - i) the first Sale or Use of a LICENSED PRODUCT upon which royalties are payable hereunder, or
 - ii) the first payment of Annual Minimum Royalties as hereafter provided, or
 - iii) termination of this Licence Agreement.

These fees shall be creditable against any royalties payable under this Licence Agreement other than Annual Minimum Royalties as hereinafter provided.

- c) ROYALTIES: LICENSEE shall pay to LICENSOR royalties of six per cent (6%) of the NET SALES VALUE of all LICENSED PRODUCTS made, sold or used by LICENSEE or any AFFILIATE or SUB-LICENSEE in the TERRITORY under this Licence Agreement.
- d) ANNUAL MINIMUM ROYALTIES: LICENSEE shall pay to LICENSOR Annual Minimum Royalties in accordance with SCHEDULE B, PART 1 hereof payable within the first thirty (30) days of 1990 or the first full calendar year after the first commercial sale or use of any LICENSED PRODUCT by LICENSEE, any AFFILIATE or SUB-LICENSEE, whichever occurs first. Should the Royalties paid by LICENSEE hereunder in any calendar year (in which Annual Minimum Royalties are due) be less than the Annual Minimum Royalties listed in SCHEDULE B, then LICENSEE, any AFFILIATE or SUB-LICENSEE shall pay to LICENSOR the difference, if any, between the listed amount and total royalties due. No amount of earned royalty paid for a given calendar year, nor any portion thereof, shall be carried over as a credit against the Annual Minimum Royalty payment payable for any succeeding calendar year, nor shall an Annual Minimum Royalty for any given calendar year be carried over as credit against earned royalty for any succeeding year.

e) Royalties shall be paid pursuant to ARTICLE 3(c) hereof on all LICENSED PRODUCTS made, Sold or Used in the TERRITORY under this Licence Agreement; however, earned royalty shall be payable hereunder as to a given LICENSED PRODUCT only when a licence or an immunity granted under ARTICLE 2 hereof is utilised in the manufacture or Sale of Use thereof, and the earned royalty payable on a given LICENSED PRODUCT made hereunder shall not become due and owing until such LICENSED PRODUCT is Sold or Used.

Any LICENSED PATENT made under a licence granted by this Licence Agreement prior to the termination or expiration of the applicable PATENT RIGHTS and not Sold or Used prior to the termination or expiration of such PATENT RIGHTS shall be subject to the payment of royalties hereunder when Sold or Used, even though such Sale or Use occurs after the termination or expiration of all pertinent licences or rights granted hereunder. The royalties for any particular LICENSED PRODUCT shall be due upon the first bona fide arm's length Sale or Use thereof and any subsequent Sale or Use of such LICENSED PRODUCT by other than LICENSEE or an AFFILIATE or a SUB-LICENCEE shall be royalty free.

- f) Notwithstanding the provisions of ARTICLE 3(e) hereof, in the case of transfers or Sales of any LICENSED PRODUCT between LICENSEE and an AFFILIATE or between AFFILIATES, one and only one royalty shall be payable thereon and such royalty shall become payable upon the final Sale thereof to a third party or final Use thereof by LICENSEE or AFFILIATE.
- LICENSEE RECORDS: LICENSEE shall keep full, true and accurate books **g**) of accounts containing all particulars which may be necessary for the purpose of showing the amount payable to LICENSOR by way of royalty as aforesaid or by way of any other provision hereunder. Said books and the supporting data shall be maintained and kept open at all reasonable times, for three (3) years following the end of the calendar year to which they pertain (and access shall not be denied thereafter, if reasonably available), for the inspection of an independent public accountant retained by LICENSOR and reasonably acceptable to LICENSEE for the purpose of verifying LICENSEE'S royalty statements, or LICENSEE'S compliance in other respects with this Licence Agreement. Names of customers and other confidential information shall not be disclosed to LICENSOR by such independent accountant. Such accountant shall be retained at LICENSOR's sole expense, unless during any such inspection a deficiency in payments to LICENSOR of ten per cent (10%) or more is determined to exist in which event LICENSEE shall within thirty (30) days reimburse LICENSOR for the expense of retaining such accountant.

- h) REPORTS BY LICENSEE: LICENSEE within thirty (30) days after the first day of January, and July of each year shall deliver to LICENSOR a true and accurate report, giving such particulars of the LICENSED PRODUCTS made, Used or Sold by LICENSEE and AFFILIATES and SUB-LICENSEES during the preceding six (6) months ('Accounting period') under this Licence Agreement as are pertinent to an accounting for royalty under this Licence Agreement. These shall include at least the following, stated as to the LICENSED PRODUCTS:
 - the quantity of LICENSED PRODUCTS billed by LICENSEE and AFFILIATES and SUB-LICENSEES during those six (6) months and the billings therefore;
 - ii) the allowable deductions therefrom;
 - iii) the calculation of royalties thereon;
 - iv) the amount of LICENSED PRODUCTS Used, Sold or otherwise disposed of during those six (6) months subject to ARTICLE 1 hereof;
 - v) the calculation of royalties due by AFFILIATES or SUB-LICENSEES; and
 - vi) the total royalties so calculated.

Simultaneously with the delivery of each such report, LICENSEE shall pay to LICENSOR the royalty and any other payments due under this Licence Agreement for the period covered by such report subject to any outstanding credit from Maintenance Fees paid in accordance with ARTICLE 3(b). If no royalties are due, it shall be so reported.

Royalties shall be paid to a bank nominated in writing by LICENSOR or in the absence of such bank at LICENSOR's office specified for the purpose of giving notice in ARTICLE 11(b) hereof. All reports shall be addressed to said address for notice unless otherwise advised in writing.

LICENSOR agrees to maintain information in such reports in confidence to the same extent that it maintains like information of its own in confidence, subject to LICENSOR's obligation to report information under said Invention Administration Agreements with UNIVERSITY and COUNCIL.

 All amounts payable hereunder by LICENSEE to LICENSOR shall be payable in United Kingdom currency collectable at part in London, England. In the event any LICENSED PRODUCT shall be Sold by LICENSEE or an AFFILIATE or SUB-LICENSEE for currency other than the currency of United Kingdom (Pounds Sterling) the earned royalty payable as to such LICENSED PRODUCT under ARTICLE 3(c) hereof shall first be determined in the currency for which the LICENSED PRODUCT was Sold and then converted into its equivalent in the currency of United Kingdom as follows:

- the average selling rate for Sterling currency as published by a leading commercial bank in a major city of the country of which such foreign currency is the national currency for such Accounting period, or
- ii) the average buying rate for such foreign currency as published by a leading London, England, bank for such Accounting period.

If the law or regulations of any country shall at any time operate to prohibit the transfer of funds therefrom to the United Kingdom, LICENSEE shall have the right to pay royalties hereunder on account of the Sales or Use in such country by depositing local currency to the account of LICENSOR in a bank in such country and notifying LICENSOR to such effect. LICENSEE shall thereafter cooperate with LICENSOR by all lawful means to obtain the lawful release of said funds to LICENSOR but shall have no further responsibility therefore.

- j) In the event that any payment required under this Licence Agreement shall be overdue for ten (10) days, LICENSEE shall pay interest thereon at an annual rate of twelve per cent (12%) computed from the date when the payment became due; provided however that if such twelve per cent (12%) rate shall be in excess of that allowed by applicable law, then the highest rate permitted by law shall apply.
- k) In the event that LICENSEE, SUB-LICENSEE or AFFILIATE is subject to the payment of royalties in one or more countries for the LICENSED PRODUCT to any third party in respect of any patent of said third party in said country or countries then LICENSEE shall reduce the royalties due to LICENSOR by the amount of royalties paid to such third party but in no event shall the royalties paid to LICENSOR be reduced to less than four per cent (4%) of the NET SALES VALUE in accordance with ARTICLE 3(c) and to less than five per cent (5%) of the NET SALES VALUE in accordance with ARTICLE 15(a)(iii). As of the effective date of this Agreement, LICENSEE warrants that it is unaware of any potential payment of royalties required to any third party for any LICENSED PRODUCT or LICENSED METHOD.
- REPORTS BY LICENSOR: LICENSOR shall provide LICENSEE with updated SCHEDULE A at least biannually from the effective date of this Agreement. If no change has occurred to SCHEDULE A, it shall be so reported.

4 **DILIGENCE**

- a) LICENSEE shall exercise reasonable diligence in developing, testing, manufacturing, promoting, advertising and selling LICENSED PRODUCTS in LICENSED FIELD. In the course of such diligence LICENSEE shall, either directly or through an AFFILIATE or SUB-LICENSEE to which the licence shall have been extended pursuant to ARTICLE 2(b) or 2(d) hereof, do the following:
 - Develop and Sell or Use within two (2) years of the date of this Licence Agreement at least one RADIOACTIVE LABELLED COMPOUND in the USA and at least one further country of the TERRITORY.
 - ii) In order to keep LICENSOR apprised of the progress of the development, submit progress reports as to its activities in the development of LICENSED PRODUCTS in the LICENSED FIELD, the first such report to be submitted six (6) months from the date of this Licence Agreement and further such reports to continue to be submitted at six (6) month intervals thereafter until at least one LICENSED PRODUCT is being Sold on a regular commercial basis in each country of the TERRITORY.
- b) In the event of non-performance of this ARTICLE 4, or any subparagraph thereof, LICENSOR shall have the right to convert the exclusive licence set forth in ARTICLE 2(b) to a non-exclusive licence as set forth in ARTICLE 2(a) for each country in which a RADIOACTIVE LABELLED COMPOUND has not been Sold within two (2) years of the date of this Licence Agreement. Such conversions to be effective thirty (30) days after written notice to LICENSEE.
- c) LICENSOR agrees to maintain information in such reports in confidence to the same extent that it maintains like information of its own in confidence, subject to LICENSOR's obligation to report information under said Invention Administration Agreement with UNIVERSITY and COUNCIL.
- d) In the event LICENSOR does not obtain at least one patent in the United States and the United Kingdom covering the PATENT RIGHTS within seven (7) years of the date of this Agreement, then the royalties due under ARTICLE 3 (c) and ARTICLE 15 (a)(iii) shall each be reduced by one per cent (1%) annually to a minimum of three per cent (3%).

5. TERMINATION

- a) Subject to ARTICLE 11(e) hereof, if LICENSEE shall become bankrupt or insolvent and/or if the business of LICENSEE shall be placed in the hands of a Receiver, Assignee, or Trustee, whether by the voluntary act of LICENSEE or otherwise, this Licence Agreement shall immediately terminate.
- b) Upon any material breach of or default under this Licence Agreement by either party, the other party may terminate this Licence Agreement by thirty (30) days written notice by registered mail to the breaching party. Said notice shall become effective thirty (30) days after the mailing of said notice, unless during said thirty (30) days such breach or default is cured.
- c) After the second year of this Licence Agreement, LICENSEE may terminate this Licence Agreement on the last day of each calendar year by three (3) months prior written notice to LICENSOR.
- d) Upon termination of this Licence Agreement for any reason, all rights granted hereunder shall revert to LICENSOR for the benefit of LICENSOR.
- e) LICENSEE'S obligations to report to LICENSOR and to pay royalties to LICENSOR as to any LICENSED PATENT made, Sold or Used under a licence or an immunity granted pursuant to this Licence Agreement prior to termination or expiration of this Licence Agreement shall survive such termination or expiration and any termination of this Licence Agreement shall be subject to this ARTICLE 5(e).
- f) Upon any termination of this Licence Agreement its provisions shall continue in force and effect to the extent necessary to effectuate any provision which by its terms clearly shall continue beyond such termination.

6. ASSIGNMENT

This Licence Agreement shall not be assigned by LICENSEE, except as part of a sale of all or substantially all of LICENSEE's business, to which the LICENSED PRODUCTS pertain and, in such event, only in its entirety and upon prior written notice to LICENSOR; and the term 'LICENSEE' where used in this Licence Agreement shall thereafter mean such assignee of LICENSEE.

7. INFRINGEMENT

- a) LICENSEE shall advise LICENSOR of any infringement of the PATENT RIGHTS of which it is aware.
- b) If at any time a third party shall infringe a patent licensed to LICENSEE under this Licence Agreement in any country, then (1) LICENSOR may obtain a discontinuance of such infringing operations; (2) LICENSOR at its option, may bring suit at its own expense; or (3) if LICENSOR declines to bring suit, LICENSEE may bring suit in accordance with ARTICLE 7(d) at LICENSEE's expense against such infringer in the name of LICENSEE, or jointly in the name of legally indispensable parties.
- c) If LICENSOR elects to bring suit, LICENSOR shall control the prosecution thereof, and LICENSEE shall be entitled to be represented in such suit by counsel of its own selection at its own expense. In such case any recoveries received shall first be applied to reimburse LICENSOR for litigation costs, and the balance if any shall be shared by LICENSOR receiving seventy five per cent (75%) and LICENSEE receiving twenty five per cent (25%) of such balance, except that if such recoveries explicitly include amounts for lost profits and for royalties in addition to amounts sufficient to reimburse LICENSOR for litigation costs, LICENSOR shall receive the entire amount of such royalties and LICENSEE shall receive the entire amount of such lost profits.
- d) If LICENSEE brings suit as provided in ARTICLE 7(b), LICENSEE shall control the prosecution thereof. In such case, any recoveries received shall first be applied to reimburse LICENSEE for litigation costs and the balance, if any, shall be shared by LICENSEE receiving seventy five per cent (75%) and LICENSOR receiving twenty five per cent (25%) of such balance, except that if such recoveries explicitly include amounts for lost profits and for royalties in addition to amounts sufficient to reimburse LICENSEE for litigation costs, LICENSOR shall receive the entire amount of such royalties and LICENSEE shall give careful consideration to the views of LICENSOR in making its decision whether or not to sue, and LICENSOR shall be entitled to be represented in such suit by counsel of its own choice at its own expense.
- e) If LICENSEE decides to sue and LICENSOR, UNIVERSITY and INVENTORS are legally indispensable parties, LICENSOR, UNIVERSITY and INVENTORS have the right to assign to LICENSEE all of their right, title, and interest in the patent or patents concerned, subject to all government or other third party rights therein, in which event suit by LICENSEE on such patent or patents shall thereafter be brought or

continued solely in its name if LICENSOR, UNIVERSITY and INVENTORS are no longer indispensable parties. Patents assigned by LICENSOR, UNIVERSITY and INVESTORS hereunder shall remain subject to the same royalty and all other applicable terms and conditions of this Licence Agreement.

f) In the event that a third party is infringing a patent licensed to LICENSEE in any country such that said third party has acquired at least a market share of twenty per cent (20%) in that country with such infringing product and, as a consequence of such competition LICENSEE's gross profit margin (calculated in accordance with generally accepted accounting principles) is reduced by more than ten per cent (10%), and if LICENSOR has not, within six (6) months following written notice of such infringement from LICENSEE, succeeded in abating the infringement and neither LICENSOR nor LICENSEE has brought suit as provided for in ARTICLE 7(c) and 7(d) above, then for the period of time that such infringement exists, then the royalties due in ARTICLE 3(c) shall be reduced from six per cent (6%) to four per cent (4%) and the royalties due in ARTICLE 15(a)(iii) shall be reduced from seven per cent (7%) to four per cent (4%).

8. STATUS OF THE PATENT RIGHTS

- a) LICENSOR at its expense shall diligently maintain and prosecute the patent applications filed within the PATENT RIGHTS to obtain patents thereon. LICENSOR does not represent or warrant that any patent will be obtained and LICENSOR in its sole discretion shall be responsible for determining whether to abandon any or all of said patent applications.
- b) LICENSOR at its expense shall be responsible for maintaining the patents obtained on the patent applications referred to in ARTICLE 8(a) hereof.
- c) Should LICENSOR in its sole discretion determine that it no longer wishes to maintain any of such patents, or maintain or prosecute any of such patent applications, LICENSOR shall so notify LICENSEE in writing of such determination and afford LICENSEE the opportunity of assuming the responsibility for, and expense of, maintaining such patents or maintaining and prosecuting such patent applications on behalf of LICENSOR.
- d) Subject to this ARTICLE 8, nothing in this Licence Agreement shall be construed to require LICENSOR to file or prosecute any patent application or to maintain any patent.

- e) In the event that LICENSEE elects under above ARTICLE 8(c) hereof to maintain any patent or maintain and prosecute any patent application, LICENSEE shall be entitled to credit its out-of-pocket expenses for such maintenance or prosecution against earned royalties payable under ARTICLE 3(c) hereof with respect to LICENSED PRODUCTS as to which such earned royalties are payable, solely on the basis of the pertinent patent application or patent as to which such out-of-pocket expenses shall have been incurred by LICENSEE.
- f) Upon written request by LICENSEE, LICENSOR will advise LICENSEE of the status of all patent applications and patents within the PATENT RIGHTS.
- g) Within one year of this Licence Agreement LICENSOR at its expense shall file and prosecute at least one patent application, or a European Patent Application, or Patent Cooperation Treaty Application designating France, West Germany, Italy, the U.S, Belgium, The Netherlands, Spain and Japan corresponding in scope to those listed in SCHEDULE A hereof having regard to the laws of these countries.

9. EXCLUSIVITY

Subject to ARTICLES 4(b), 11(e) and 11(f) hereof, the licence and rights granted to LICENSEE under ARTICLE 2(b) hereof shall be exclusive to LICENSEE in each country within the PATENT RIGHTS in that LICENSOR shall not grant another concurrently effective licence for RADIOACTIVE LABELLED COMPOUNDS for use in the LICENSED FIELD under the pertinent PATENT RIGHTS during the period extending from the effective date of this Licence Agreement until either:

- i) the end or the fifteenth (15) year from the date of this Licence Agreement: or
- ii) termination of this Licence Agreement: whichever is first to occur.

10. NON-USE OF NAMES

- a) LICENSEE shall not use the name of any INVENTOR of the PATENT RIGHTS, UNIVERSITY or of any institution with which said INVENTOR has been or is connected, or of LICENSOR, or any adaptation of any of them, in any advertising, promotional or sales literature, without prior written consent obtained from LICENSOR in each case. LICENSEE shall require its AFFILIATES and SUB-LICENSEES to comply with this ARTICLE to the same extent that it applies to LICENSEE.
- b) LICENSOR shall not use the name of LICENSEE, or any adaptation thereof, in any advertising, promotional or sales literature or in any press release without prior written consent of LICENSEE in each case.

11. GENERAL

- a) This Licence Agreement constitutes the entire agreement between the parties as to the PATENT RIGHTS, and all prior negotiations, representations, agreements and understandings are merged into, extinguished by and completely expressed by it.
- b) Any notice required or permitted to be given by this Licence Agreement shall be given by postpaid, first class. registered or certified mail addressed to:

or

Such addresses may be altered by written notice so given. If no time limit is specified for a notice required or permitted to be given by this Licence Agreement, the time limit therefore shall be ten (10) full business days, not including the day of mailing.

- c) This Licence Agreement and its effect are subject to and shall be construed and enforced in accordance with the law of England, except as to any issue which by the law of England depends upon the validity, scope or enforceability of any patent within the PATENT RIGHTS, which issue shall be determined in accordance with the applicable patent laws of the country of such patent.
- d) LICENSOR and LICENSEE shall endeavour amicably to settle any disputes arising under this Licence Agreement. If the parties are unable to settle any dispute by themselves, then any such dispute arising in connection with this Licence Agreement shall be submitted first to

alternative dispute resolution proceedings and, if that fails, then such dispute shall be finally settled by arbitration conducted in England by and in accordance with the rules then obtaining of the London Court of Arbitration and judgment upon the award rendered may be entered in the highest court of the forum having jurisdiction. The provisions of this ARTICLE 11(d) shall not apply to any dispute or controversy as to which any treaty or law prohibits settlement as contemplated under this ARTICLE.

- e) Nothing in this Licence Agreement shall be construed so as to require the commission of any act contrary to law, and wherever there is any conflict between any provision of this Licence Agreement or concerning the legal right of the parties to contract and any statute, law, ordinance or treaty, the latter shall prevail, but in such event the affected provisions of this Licence Agreement shall be curtailed and limited only to the extent necessary to bring it within the applicable legal requirements.
- f) Notwithstanding anything to the contrary in this Licence Agreement, nothing herein contained shall be construed as a representation by LICENSOR that the PATENT RIGHTS can be or will be used to prevent the importation by a third party of a product into or the sale or use by such third party in any country within the TERRITORY having PATENT RIGHTS, where such product shall have been placed in commerce under circumstances which preclude the use of the PATENT RIGHTS to prevent such importation or sale or use by reason of any applicable law or treaty.
- g) LICENSEE shall take all reasonable and necessary steps to register this Licence Agreement in any country, where such is required to permit the transfer of funds and/or payment of royalties to LICENSOR hereunder or is otherwise required by the government or law of such country to effectuate or carry out this Licence Agreement or to ensure the effectiveness of the PATENT RIGHTS. Notwithstanding anything contained herein, but subject to ARTICLE 11(e) hereof, LICENSEE shall not be relieved of any of its obligations under this Licence Agreement by any failure to register this Licence Agreement in any country, and, specifically, LICENSEE shall not be relieved of its obligation to make any payment due to LICENSOR in the manner specified in ARTICLE 3(h), where such payment is blocked due to any failure to register this Licence Agreement.
- h) It shall be the full and sole responsibility of LICENSEE and its AFFILIATES to use appropriate care in the practice of any manufacture and use of any product pursuant to any licence or immunity granted

hereunder and LICENSOR shall have no right to control the manner in which any product is manufactured or used or the material from which any product licensed hereunder is manufactured and LICENSOR shall not be required to provide any know-how or operating instructions or other information with respect to any such product or manufacture or use of such product and LICENSOR makes no representation or warranty whatsoever with respect to any such product or manufacture of use thereof.

- i) Nothing in this Licence Agreement shall be construed as a representation or a warranty by LICENSOR as to the validity or scope of any patent within the PATENT RIGHTS or that any product made, Used or Sold or otherwise disposed of under any licence or annuity granted under this Licence Agreement or any process for manufacture thereof is or will be free from infringement of patents of third parties.
- j) LICENSEE agrees to indemnity and hold harmless INVENTORS, LICENSOR, UNIVERSITY and COUNCIL and their respective officers, directors, employees and agents from and against any and all claims, damages and liabilities asserted by third parties, both government and private, arising from LICENSEE's, AFFILIATE's and SUB-LICENSEE's manufacture, use or sale of LICENSED PRODUCTS or the use thereof by others against said claims, damages and liabilities including ultimate consumers unless such claims, damages and liabilities arise from the negligence of the INVENTORS, UNIVERSITY OR LICENSOR.
- k) As used in this Licence Agreement, singular includes the plural and plural includes the singular, wherever so required by the context. The headings appearing at the beginning of the numbered ARTICLES hereof have been inserted for convenience only and do not constitute a part of this Licence Agreement.
- I) Any agreement or arrangement relating to the PATENT RIGHTS between LICENSEE and any third party including AFFILIATE or SUB-LICENSEE shall be made expressly subject to the terms and conditions of this Licence Agreement particularly but not limited to ARTICLES 13 and 14 and LICENSEE shall require such other party to comply therewith to the same extent that LICENSEE is required to comply.
- m) LICENSOR shall procure from INVENTORS for supply to LICENSEE free of charge, within three (3) months of the effective date of this Licence Agreement, reasonable quantities of:
 - i) named products A
 - ii) named products B

12. EFFECTIVE DATE AND TERM

This Licence Agreement shall become effective on the day and year first above written and, unless terminated earlier by one of the parties in accord with its terms, shall expire concurrently with the expiration, invalidation or lapsing of all issued patents within the PATENT RIGHTS and/or the abandonment of all pending patent applications within the PATENT RIGHTS.

13. EXTENSION OF PATENT RIGHTS

LICENSEE shall cooperate with LICENSOR in seeking any extension that is available or that becomes available in respect of the term of any patent within the PATENT RIGHTS including any patent that may issue on a patent application within the PATENT RIGHTS and LICENSEE shall diligently advise LICENSOR in a timely manner of approval of any Government approval required to use or market LICENSED PRODUCTS obtained by or on behalf of LICENSEE or an AFFILIATE or a SUB-LICENSEE that is pertinent to any such extension and LICENSEE shall supply LICENSOR with any pertinent information and data in its possession or control or that is in the possession or control of any AFFILIATE or SUB-LICENSEE and LICENSEE shall cooperate fully in assisting LICENSOR to obtain any such extension that it may seek and LICENSEE shall supply LICENSOR in a timely manner with any information and data and any supporting affidavits or documents required to comply with 35 USC 156 Extension of Patent Term (and any successor legislation) and any administration rules or regulations thereunder or required to comply with any corresponding laws and regulations that are or shall be in effect in any country within the PATENT RIGHTS, all without further consideration. LICENSEE shall require its AFFILIATES and SUB-LICENSEES to comply with this ARTICLE 13 and each AFFILIATE or SUB-LICENSEE agreement shall include a clause essentially like this ARTICLE 13.

14. GOVERNMENT RIGHTS

- a) LICENSEE shall comply in all respects with the applicable provisions of any applicable law, requirements, regulation or determination by any Government relating to the PATENT RIGHTS and shall provide LICENSOR with any information or report required to comply with any such law, recruitment, regulation or determination.
- b) Any inconsistency between this Licence Agreement and the pertinent provisions of any law, requirement, regulation or determination by a Government shall be resolved by altering the relevant terms of this Licence Agreement so as to conform to such provisions of any such law, requirement, regulation or determination.

c) Any licence or other right granted or to be granted pursuant to this Licence Agreement and any term of exclusivity applicable to such licence or right shall be subject to any and all applicable governmental laws and regulations relating to compulsory licensing.

15. OPTION

- a) If LICENSEE so desires and gives written notice within three (3) years from date of this Licence Agreement, this Licence Agreement will be amended by the effect of said written notice and proof of receipt thereof by LICENSOR thirty (30) days from date of said notice to include within the definition of LICENSED FIELD, Manufacture, Use and Sale of LICENSED PRODUCTS in KIT FORM. This Option shall be exercised subject to the following payments:
 - i) Option Exercise Fee of Pounds Sterling (£) payable on said date of amendment of this Licence Agreement.
 - The Licence Maintenance Fee in accordance with ARTICLE 3(b) shall be increased for each year subsequent to the year in which such amendment is effected by (£).
 - iii) The royalty payable in accordance with ARTICLE 3(c) shall be seven per cent (7%) of the Net Sales Value of the Kit containing the LICENSED PRODUCT.
 - iv) LICENSEE shall pay Annual Minimum Royalties in accordance with ARTICLE 3(d) and SCHEDULE B, PART II for sales of LICENSED PRODUCT in KIT FORM. A Sale of LICENSED PRODUCT in KIT FORM shall not count towards the payment of Annual Minimum Royalty under ARTICLE 3(d).

IN WITNESS WHEREOF, the parties hereto have hereunto set their hands and seals and duly executed this Licence Agreement on the date(s) indicated below, to be effective the day and year first above written.

Attest:

By	_By
Assistant Secretary	Director
(SEAL of)	Date:

SCHEDULE A: PATENT RIGHTS

COUNTRY	PATENT NO.	EXPIRING DATE
COUNTRY	PENDING PATENT APPLN. NO.	FILING DATE
UK	8705811	11 MARCH 1987
UK	8715558	2 JULY 1987

SCHEDULE B: SCHEDULE OF ANNUAL MINIMUM ROYALTY PAYMENTS

PART I. ARTICLE 3D

Calendar year following year of first sale of LICENSED PRODUCT, or in 1990, whichever occurs first.

Period	Annual Minimum Royalty Payment
First Year	POUNDS STERLING
Second and subsequent years	POUNDS STERLING

PART II. ARTICLE 15 (a)(iv)

Calendar year following year of first sale of LICENSED PRODUCT in KIT FORM or in 1992, whichever occurs first (providing OPTION of ARTICLE 15 has been exercised).

Period	Annual Minimum Royalty Payment
First Year	POUNDS STERLING
Second Year	POUNDS STERLING
Third Year and subsequent years	POUNDS STERLING

Example 5

Sub-contract and development agreement

The following agreement deals with a complex arrangement in which the owner of defined intellectual property rights wishes to appoint a sub-contractor to provide development services and the manufacture of defined products according to specifications established by the owner involving the transmission but not the transfer of confidential information falling within the intellectual property rights. The products so developed and manufactured will then be sold or distributed by the owner. The agreement is for a fixed period.

This Agreement is made as of the ______ day of _____ 1999, between D&A LTD International Limited, (D&A LTD) a company organised under the laws of England of ______ (Address) and RJSG Industries Corp, (RJSG CORP) a company organised under the laws of ______ (Address).

INTRODUCTION

- A.1 D&A LTD is the proprietor or has rights from the proprietor for certain products relating to lifting and transporting of industrial components and containers.
- A.2 D&A LTD desires to have these products developed for manufacture and manufactured for distribution by D&A LTD.
- A.3 RJSG CORP has development and manufacturing facilities appropriate and sufficient for the development and manufacture of this type of product.

NOW THEREFORE IT IS AGREED:

1. DEFINITIONS

For the purpose of this Agreement unless the context clearly or necessarily indicates otherwise, the following words and phrases have a meaning set forth below:

- 1.1 Patent rights: The legal rights by way of patents, utility models, registered designs or design patents and similar registered protection generally recognised as similar to patents and registered designs, in the UK and throughout the world corresponding to the inventions as identified in the Schedule Part I to this Agreement and shall include applications for such protection.
- 1.2 Copyright Materials: all materials including industrial designs protected by statutory copyright or design rights, including graphical and threedimensional representations and textual information and/or computer programs relating to the Permitted Products.
- 1.3 Confidential Technical Information: Technical Information whether fixed or oral and contained in documents, electronic storage means and including computer program material, all relating to the Permitted Products and the manufacture of the Permitted Products whether or not also protected by Patent Rights or Copyright which Information is not in the public domain and which is supplied by one party to another before or during the term of this Agreement and information not to the public domain as to the commercial affairs of either party and supplied under this Agreement.
- 1.4 Permitted Products: Those products for lifting and transporting of industrial components and containers falling within the scope as hereinafter defined of the protection afforded by the Patent Rights, Copyright and Confidential Technical Information and any Improvements therein made during the term of this Agreement.
- 1.5 Improvements: Those changes or additions to the Permitted Products or their manufacture which falls within the scope of the Patent Rights, the Copyright on Copyright Materials and Confidential Technical Information.
- 1.6 Acts falling within the Scope of this agreement: In the context of Registered Rights, particularly Patent Rights, that the manufacture, use or sale of a process or product would be an infringement of one or more of the definitions of protection in said Patent Rights (claims in the case of patents) according to the law of the jurisdiction granting the patent

or other right. In the context of Copyright or Technical Information rights that a product made using them represents an infringement of the rights given by Copyright or comparable law on industrial designs (including design rights) according to the law of the jurisdiction wherein the copyright or industrial design right exists. In the context of Technical Information a process as carried out or the product produced using information directly derived from Confidential Technical Information.

- 1.7 D&A LTD rights: Patent Rights, Copyright Materials and Confidential Technical Information relating to the Permitted Products and which are the property of D&A LTD at the date of this Agreement and Copyright Materials and Confidential Technical Information related to Permitted Products and manufacture of Permitted Products and created during the course of this Agreement specifically for application to Permitted Products and the manufacture of Permitted Products.
- 1.8 RJSG CORP rights: Technical Information in the possession of RJSG CORP prior to the date of this Agreement and not specifically developed for application to the manufacture of Permitted Products (sometimes known as background information).
- 1.9 Net Sales Value shall mean the gross sales value of Permitted Products less the total of any direct taxes, duties, shipping, packaging and insurance. In the event of disposal of Permitted Products by D&A LTD other than by third-party customer purchase at arm's length basis, the Net Sales Value attributable to such Permitted Products shall be the equivalent of the fair market value of such Permitted Products on the open market.
- 1.10 Net Sales Income: The income actually collected during a specified period for the Net Sales amount on invoices outstanding at the beginning of the period and issued during the period.
- 1.11 Sale: Sale or disposal and includes lease, hire or other transaction which transfers ownership or possession of any Permitted Product.

2. COMMENCEMENT DATE AND TERM

- 2.1 The date at the head of this Agreement which shall also be the 'Commencement Date'.
- 2.2 The parties agree to undertake and exert their best efforts to secure any governmental approval required for this Agreement in the form as executed.
- 2.3 Term of Agreement: The Agreement and rights granted hereunder shall continue in force and effect for one year until the last day of the
anniversary month of the date of this Agreement unless determined in accordance with the provisions hereof.

2.4 The Agreement will renewal automatically for periods of one year from each date of termination unless a party gives written notice of intention to terminate more than three months before a date of termination.

3. D&A LTD OBLIGATIONS

- 3.1 D&A LTD shall supply RJSG CORP with all Technical Information which it possesses in regard to the manufacture of the Permitted Products.
- 3.2 D&A LTD undertakes to exert its best efforts to secure orders for Permitted Products produced in accordance with this Agreement both in terms of volume and price in respect of customers in the United Kingdom of Great Britain and Northern Ireland.
- 3.3 During the existence of this Agreement D&A LTD will provide to RJSG CORP information on any Improvements in the Permitted Products.
- 3.4 D&A LTD will comply with the provisions of Article 9 as to reports.
- 3.5 D&A LTD shall maintain confidential any commercial or Technical Information which it receives from RJSG CORP regarding commercial operation of RJSG CORP or its technical skills subject to the provisions of Article 14 of this Agreement.

4. **RJSG CORP obligations**

- 4.1 RJSG CORP will develop commercial manufacturing techniques, for the manufacture of the Permitted Products and will provide regular reports on the success in achieving such commercially successful manufacturing capacity and any required expansion in manufacturing capacity.
- 4.2 RJSG CORP undertakes to exert its best efforts to produce Permitted Product in quantity for commercial distribution.
- 4.3 RJSG CORP will manufacture the Permitted Product for the lowest price commensurate with quality and fitness for purpose.
- 4.4 RJSG CORP will maintain, during development of the manufacture of the Permitted Product, detailed accounts of the costs specific to such development and full details of any moulds or other dedicated materials required for manufacture of Permitted Product.

- 4.5 At the earliest reasonably possible date having regard to the normal constraints of development of a new product RJSG CORP will be prepared to manufacture and ship Permitted Product in satisfactory and commercially sufficient quantities.
- 4.6 RJSG CORP will ensure that it meets all relevant engineering standards for the fitness-for-purpose of the Permitted Product and will manufacture Permitted Products in accordance with normal RJSG CORP standards for the trade.
- 4.7 RJSG CORP undertakes to comply with all relevant regulations and codes of practice required by governmental safety legislation and to advise D&A LTD in regard to such government regulations both in relation to manufacture of Permitted Product and its distribution.
- 4.8 RJSG CORP undertakes to provide sufficient manufacturing capacity and appropriately skilled and qualified personnel to comply with the reasonable standards of production including satisfying for any reasonable commercial period the anticipated demand for Permitted Product advised to it by D&A LTD.
- 4.9 RJSG CORP will provide to D&A LTD copies of all Technical Information relating to the manufacture of Permitted Products including copies of graphic and textual materials and will ensure that the personnel responsible for such material are identified and where necessary execute such documentation as is necessary to evidence of ownership by RJSG CORP and in turn by D&A LTD.
- 4.10 RJSG CORP shall not manufacture or distribute any product which is competitive with the Permitted Product except to the extent that RJSG CORP has manufactured such product prior to the date of this Agreement providing that such manufacture prior to the date of this Agreement has been advised to D&A LTD before execution of this Agreement.
- 4.11 RJSG CORP shall only manufacture Permitted Product for supply to D&A LTD and shall not undertake distribution directly of Permitted Product nor supply Permitted Product to any other party.
- 4.12 RJSG CORP shall maintain confidential all information which it receives or develops relevant to manufacture of Permitted Product which is D&A LTD Technical Information but shall not be obligated in respect of RJSG CORP Technical Information.

5. WARRANTIES OF D&A LTD

- 5.1 D&A LTD warrants that it is the proprietor of the Patent Rights and any other Copyright in materials or Confidential Technical Information that it provides to RJSG CORP and it is not aware of any third party rights which could be infringed by manufacture of Permitted Product by RJSG CORP.
- 5.2 D&A LTD will indemnify RJSG CORP in respect of any damages or costs arising from action by a third party on a claim that manufacture of Permitted Product is an infringement of the rights of said third party with the proviso that such indemnification shall not apply to all or part of a claim by said third party which relates to Copyright Material or Confidential Technical Information originated by RJSG CORP.

6. WARRANTIES BY RJSG CORP

- 6.1 RJSG CORP is free to enter into this Agreement and has no arrangements with any other party which would impede its capacity or ability to fulfil its obligations under this Agreement.
- 6.2 RJSG CORP has the necessary capacity and skilled personnel at the date of this Agreement to undertake manufacture of Permitted Product to the quality standards and in the volume presently anticipated by the parties during two years from the date of the Agreement.

7. INDEMNITY AS TO STAFF

7.1 Each party shall indemnify the other party and hold that party harmless from any liability resulting from injury to or death of any of the first party's employees occurring on the premises of that other party, except such injury or death as may have resulted from negligence on the part of that other party.

8. INITIAL PAYMENT

- 8.1 The parties will agree for each quarter commencing 1 January, 1 April, 1 July and 1 October of each calendar year a price to be paid to RJSG CORP for delivery of Permitted Product. This price will be based on the costs of RJSG CORP for:
 - a) Materials purchased and incorporated into product;
 - b) Direct labour costs (not overhead costs);
 - c) Cost of delivery to D&A LTD.

- 8.2 RJSG CORP will invoice D&A LTD upon delivery of product at the currently agreed RJSG CORP PRICE.
- 8.3 D&A LTD will provide within 30 days following the end of each three month period ending 31 March, 30 June, 30 September and 31 December of each calendar year:
 - a) A list of all invoices rendered for sale by D&A LTD of Permitted Product;
 - b) A list of payments received for all invoices rendered by D&A LTD for sale of Permitted Product.
- 8.4 From the Net Sale Income received during said quarter D&A LTD will:
 - a) Settle all invoices rendered by RJSG CORP for Permitted Product delivered to D&A LTD where D&A LTD has sold such Permitted Product and received payment on the invoices for such sales.
 - b) From the balance of Net Sale Income after settlement of RJSG CORP invoices in accordance with Article 8.4A D&A LTD will then deduct:
 - (i) All expenses incurred during the relevant period for costs in relation to patent rights including costs of filing, prosecution and maintenance and any accrued expenses not previously deducted.
 - ii) Costs incurred by D&A LTD for travel expenses directly related to marketing and achieving sales.
 - iii) Costs of sales/marketing brochures, exhibition fees, advertising costs, publicity material costs.
 - iv) Costs of packaging, insurance and shipping not previously deducted in calculation of Net Sales Price.
 - Any specific direct labour costs involved in the receipt of Permitted Products, packaging and shipping to clients but excluding 'overhead costs' plus staff salaries.

(All of the above hereinafter identified as D&A LTD EXPENSES.)

8.5 The balance after deduction from the Net Sales Income of said payable RJSG CORP invoices and said by D&A LTD. Expenses will be divided equally between the two parties and D&A LTD will pay the sum due to RJSG CORP by the last day of the month following the three months in question.

- 8.6 In the event that on calculation of said balance from Net Sales Income, said balance is negative then the parties will apportion the Net Sales Income to RJSG CORP and D&A LTD in the respective proportions that the total of payable RJSG CORP invoices and D&A LTD expenses each bear to the Net Sales Income.
- 8.7 Any balance of said RJSG CORP Payable Invoices and D&A LTD Expenses will then be carried forward to the following quarter.

9. MEETINGS AND ESTIMATES

- 9.1 During each quarter, but no later than the last day of the second month, the parties will meet to:
 - a) Review progress on sales and manufacture of Permitted Product.
 - b) Agree production targets for the next quarter and estimate targets for the following quarter.
 - c) Exchange best estimates for the invoices that will be rendered by RJSG CORP, potential sales by D&A LTD and potential collection of D&A LTD invoices for calculation of Net Sales Income for the current quarter and the following quarter.
- 9.2 Each party agrees to keep true and accurate books of accounts in regard to all Permitted Products which have been manufactured and sold. Each party shall through an independent accountant representative, have the right to inspect the other's books of accounts at any reasonable time, but not more often that once each calendar year upon reasonable notice in writing to the other party.

10. OWNERSHIP

10.1 In consideration that the development by RJSG CORP of Permitted Product will create Copyright Materials and Confidential Technical Information and that the capacity to manufacture successfully Permitted Product is intended as an inducement to D&A LTD to enter this contract, therefore RJSG CORP agrees that Patent Rights, Copyright and Confidential Technical Information, except to the extent that it is RJSG CORP Technical Information, shall vest in and be the absolute property of D&A LTD when developed in the course of achieving successful commercial manufacture of the Permitted Product.

- 10.2 To the extent that RJSG CORP develops techniques and operations which have application to manufacture of product other than Permitted Product, then RJSG CORP shall have a royalty free non-exclusive licence to use such Technical Information for the manufacture of such other products. RJSG CORP will not sub-licence such information or permit others to use the said information and will accept an obligation to the confidentiality in regard to said application of information as to any other aspect of D&A LTD information.
- 10.3 In respect of copyright in all drawings, specifications and manufacturing of data for or relating to Permitted Product and which is created by RJSG CORP during the life of this Agreement then this Agreement shall be effective as an assignment of such copyright to D&A LTD.
- 10.4 In the event that this Article 10 is held wholly or particularly invalid as to assignment of ownership for RJSG CORP to D&A LTD then D&A LTD shall have a non-cancellable worldwide, royalty free, non-exclusive sublicensable licence to Patent Rights, Copyright and Confidential Technical Information developed by RJSG CORP relevant to Permitted Products or Improvements therein.

11. IMPROVEMENTS

- 11.1 RJSG CORP undertakes to keep D&A LTD informed of any patented or unpatented Improvement of the Permitted Product produced by or developed by or made available to RJSG CORP during the term of this Agreement.
- 11.2 In consideration of the nature of the capacity of RJSG CORP to develop the manufacturing technique for the Permitted Product RJSG CORP hereby assigns to D&A LTD any rights in said Improvement and shall, where necessary, complete any formal documents necessary for the protection of said Improvement and the recording of the ownership of D&A LTD.
- 11.3 Neither party shall be obliged by the term of this section to communicate to the other party information or documents which it is not legally or contractually free to disclose to the other party, or the disclosure of which would violate the rights of any third party.
- 11.4 Neither party shall be obliged by the terms of this section to grant licences to the other party which it is not legally and contractually free to grant to that party or the grant of which would violate the rights of any third party.

- 11.5 The inadvertent failure of either party to inform the other party of any patented or unpatented improvement, enhancement or development of the Permitted Product, or the existence of information including documentation pertaining to the Permitted Product shall not be deemed to be a breach of the Agreement.
- 11.6 Where one party requests the other party to supply documentation or other Know-how material relating to any Improvement of the Permitted Product the other party shall supply to the first party such documentation or material as is in its possession, and which it is legally free to disclose, within sixty (60) days of receipt of the request from the first party.

12. TAXATION

12.1 During the period that the payments due hereunder from the D&A LTD to RJSG CORP are within the provisions of a law rendering said payments liable to any tax, the amount of the tax shall be added to the sums calculated as hereinbefore set forth. In the event that and during the period that either party is a taxable person, it shall be entitled to call for an invoice and receipt showing the said tax was paid by the other party and the sums on which it is calculated.

13. RJSG CORP ASSURANCE

- 13.1 Since D&A LTD shall not be responsible for the day-to-day supervision of the operation of RJSG CORP and also the maintenance of RJSG CORP control standards and without prejudice to the generality of the indemnity provided by RJSG CORP to D&A LTD in respect of liability of D&A LTD to third parties under this Agreement (which third parties shall include customers of D&A LTD, purchasers of D&A LTD products and employees of D&A LTD), RJSG CORP specifically undertakes to indemnify D&A LTD in respect of any liability arising from damage, injury or any other ill effect caused by defect in the manufacture or design or operation of Permitted Products except insofar as said defect arises from defects in design information supplied by D&A LTD.
- 13.2 RJSG CORP shall secure appropriate liability insurance for the design and manufacture of the Permitted Products and operation of the Permitted Products at RJSG CORP'S cost and shall name D&A LTD as insured party in respect of design liability for Permitted Product. RJSG CORP shall provide evidence of such insurance as well as maintenance thereof.

14. CONFIDENTIAL INFORMATION

- 14.1 Each party agrees for itself, its officers, employees and agents, that, except as hereinafter provided, it will not at any time make any unauthorised use of, and will not disclose but will keep confidential, all Confidential Information provided under this Agreement.
- 14.2 Sub-section 14.1 hereof shall cease to have effect if and to the extent that the Confidential Information:
 - 14.2.1 is published or otherwise comes into the public domain other than by a breach of Sub-section 14.1 hereof; or
 - 14.2.2 was known to the receiving party at the Commencement Date; or
 - 14.2.3 is lawfully acquired by the receiving party from a source other than the disclosing party.
- 14.3 Each party shall restrict disclosure of the Confidential Information to the minimum number of its employees of suitable standing and training required to enable it to carry out the purposes of the Agreement.
- 14.4 The provisions of this Section shall survive the termination of the Agreement.

15. ASSIGNMENT, SUB-LICENCE OR SUB-CONTRACT

- 15.1 RJSG CORP shall not assign, transfer, mortgage, charge (except for any floating charge on company assets) or part with, any of its rights, duties or obligations under the Agreement or any licence to be granted pursuant thereto without the previous written consent of D&A LTD.
- 15.2 RJSG CORP has no power to sub-licence or grant any other rights on the Patent Rights, Copyright or Confidential Technical Information which are provided to RJSG CORP or come into existence by reason of this Agreement with the exception of RJSG CORP Technical Information as hereinbefore defined.
- 15.3 RJSG CORP shall not further sub-contract manufacture of Permitted Product except with prior written permission of D&A LTD.
- 15.4 RJSG CORP has no rights to trade names or trade marks or other trading identifiers of D&A LTD and to the extent that it is authorised to apply on the instructions of D&A LTD such trade marks, trade names or other trading identifiers to Permitted Product this is solely for the purpose of supplying such product to D&A LTD and gives no rights in said trade marks, trade names or other trading identifiers.

16. TERMINATION

- 16.1 The Agreement may be terminated by either party by written notice to the other, upon any one of the following events:
 - 16.1.1 In the event that the other party materially breaches any of the terms of the Agreement and such breach is not remedied within a period of sixty (60) days after notification thereof.
 - 16.1.2 In the event that the Agreement or any material part hereof is held invalid or unenforceable by the determination of any agency or government, or any court of competent jurisdiction and the parties fail to reach agreement as to a reasonable modification thereof.
- 16.2 D&A LTD may determine the Agreement and the rights hereunder at any time by notice in writing to RJSG CORP if RJSG CORP has a receiver or manager appointed of any part of its assets, or if an order is made or resolution passed for winding-up RJSG CORP, or if circumstances arise which entitle the Court or a creditor to appoint a receiver or manager, or which entitle the Court to make a winding-up order, in respect of the RJSG CORP, or RJSG CORP is ordered or adjudged bankrupt or is placed in receivership or otherwise enters into any scheme or composition with creditors or makes an unauthorised assignment for the benefit of creditors.
- 16.3 D&A LTD may determine this Agreement if as a result of a merger, reorganisation or otherwise more than fifty per cent (50%) of the voting share control of RJSG CORP is or becomes owned or controlled by any third party.

17. RIGHTS AFTER TERMINATION

17.1 Immediately upon the expiration or termination of the Agreement RJSG CORP shall transfer to D&A LTD all copyright materials, Technical Information materials, moulds used in the manufacture of Permitted Product or any other materials specifically used in the manufacture of Permitted Product. To the extent that moulds or other manufacturing material have been specifically created by RJSG CORP for the manufacture of Permitted Product, RJSG CORP shall be entitled to charge the cost price of said moulds or manufacturing material less depreciation but if D&A LTD does not desire such moulds or other manufacturing material then RJSG CORP shall provide evidence of the destruction of such moulds or material.

- 17.2 RJSG CORP shall deliver to D&A LTD all completed Permitted Product which shall become the property of D&A LTD immediately on termination of this Agreement. For such Permitted Product in the stock of either RJSG CORP or D&A LTD on the date of termination of this Agreement payment shall be in accordance with the conditions of Article 8.
- 17.3 Obligations of Confidentiality, for transfer of Patent Rights, Copyright confidential materials and specified manufacturing materials and Stocks of Permitted Product and for payment shall survive termination of this Agreement.

18. WAIVER OF DEFAULT

No waiver by either party of any default of the other party shall be held to be a waiver of any other or subsequent default. The failure of either party at any time to enforce or require performance of any of the provisions of the Agreement, or to exercise any right or option hereunder provided, shall in no way be construed to be a waiver of that or any other provisions of the Agreement or to affect the right of such party thereafter to enforce each and every such provision.

19. FORCE MAJEURE

In the event of any delay in performance of the provisions of the Agreement by either party due to any cause arising from or attributable to acts, events, non-happenings, omissions, accidents or acts of God beyond the reasonable control of the party to perform, the party so delayed or prevented shall be under no liability for loss or injury suffered by the other party thereby and the duties and obligations placed upon both parties by the Agreement shall be suspended during such delay. Upon cessation of the cause of the delay, the duties and obligations imposed upon both parties by the Agreement shall again become fully operative; provided that, if as a result of such delay any modification of the terms of the Agreement or cancellation of any part thereof is requested by one party and it is reasonable that such modification or cancellation shall be made, the Agreement will be so modified or cancelled; and provided that if such delay shall exceed six (6) months either party may give written notice of termination of the Agreement and thereupon the Agreement shall terminate forthwith.

20. MISCELLANEOUS PROVISIONS

- 20.1 The rights, duties and obligations of D&A LTD under this Agreement may be assigned by D&A LTD at any time during the period of this Agreement.
- 20.2 All notices, claims, requests and demands hereunder (herein after referred to as 'Communications') shall be in writing and shall be deemed to be duly given if mailed (by registered or certified mail, returned receipt requested and posted prepaid) to the parties at the addresses as specified at the beginning of this Agreement or to such other addresses, as have been notified by either party to the other party and receipt of which notice has been acknowledged. If mailed as aforesaid, any such communication shall be deemed to have been given on the seventh (7th) business day following that on which the communication is mailed; provided that any communication sent by facsimile transmitter or telex and confirmed by mail (postage prepaid) shall be deemed to have been given at the time of transmission.
- 20.3 Nothing contained in this Agreement shall be construed so as to give rise to an agency, partnership or joint venture between the parties.
- 20.4 This Agreement may be executed simultaneously in two or more counterparts all of which shall constitute to the Agreement but any one of which shall be deemed to be sufficient to evidence the Agreement.
- 20.5 The Agreement constitutes the entire agreement between the parties and shall not be modified or amended except by an instrument in writing of subsequent date hereto duly executed by each of the parties.

21. OTHER AGREEMENTS

21.1 RJSG CORP is aware that D&A LTD may appoint licensees for the manufacture of Permitted Products, said licensees to be appointed in the United Kingdom or elsewhere and that the existence of said licensees may affect the capacity of D&A LTD to market directly Permitted Products made in accordance with this Agreement. D&A LTD is not obligated under this Agreement to take any steps which could adversely affect a licence agreement into which it enters with another party in respect of Permitted Products.

22. CONSTRUCTION AND ENFORCEMENT

22.1 The construction, validity and performance of the Agreement and any procedural matter in the conduct of any litigation hereunder shall be governed in all respects by the laws of England. Any litigation shall, unless D&A LTD elects Courts of another jurisdiction, be in the Courts of England and the parties to this Agreement hereby submit to the jurisdiction of said Courts of England.

23. ARBITRATION/ADR CLAUSE

- 23.1 The parties to this Agreement shall endeavour amicably to settle any disputes arising under this Agreement. If the parties are unable to settle any dispute by themselves, then any such dispute arising in connection with this Agreement shall be submitted first to Alternative Dispute Resolution in accordance with the rules of the Centre for Dispute Resolution (CFDR), 100 Fetter Lane, London, EC4A 1DD or IDR Europe Limited, 3 Quays, Tower Hill, London, EC3R 6DS.
- 23.2 If D&A LTD considers such Alternative Dispute Resolution seems to have failed, then such dispute shall be finally settled by arbitration conducted in England, by and in accordance with the rules then obtaining of the London Court of Arbitration and judgment upon the award rendered may be entered in the highest court of a forum having jurisdictions over the dispute. Provisions of this Article shall not apply to any dispute or controversy as to which any treaty or law prohibits settlement as contemplated by this Article.

SCHEDULES

PART I Schedule of Patent Ri	GHTS	
'Name' of Product	D&A LTD Drawing	Patent
Application	Reference Number	Filing
Particulars (details are	confidential and have been remov	ved by author)
IN WITNESS WHEREO PRECEDING (15) PAGE	F THIS AGREEMENT CONSISTIN S ARE EXECUTED	G OF THIS PAGE AND
Signed for and on beha	lf of D&A LTD	
By:	Dire	ctor
As of the Date at the he	ead of this Agreement in the pres	ence of
	(Witness)	
	(Name)	
	Address	
	Occupatio	n
Signed for and on beha	lf of RJSG CORP Industries Limite	ed
By:	I	Director
As of the Date at the he	ead of this Agreement in the pres	ence of
	(Witness)	
	(Name)	
	Address	
	Occupatio	on

Annexes

- ANNEXE 1: REFERENCES TO LICENSING MATTERS
- ANNEXE 2: EU COMPETITION LAW AND RESTRICTIVE CLAUSES IN LICENSING AGREEMENTS
- ANNEXE 3: BASIC CLAUSES IN A HEADS OF AGREEMENT

Annexe 1: References to licensing matters

Bainbridge D.I. 1994 *Intellectual Property*, Pitman Publishing (London) ISBN 0 273 60422 8

Black T. 1989 *Intellectual Property in Industry*, Butterworths (London and Edinburgh) ISBN 0 406 10140 X

Blanco White T.A. 1983 *Patents for Inventions* (5th edition), Stevens & Sons (London) ISBN 0 420 46310 0

Fisher R. and Ury W. 1983 *Getting To Yes*, Penguin Books Ltd (England) ISBN 0 14 00 6534 2

Fowlston B. 1984 *Understanding Commercial and Industrial Licensing*, Waterlow Publishers Limited (London) ISBN 0 08 039154 0

LES Nouvelles - Quarterly professional journal on all aspects of worldwide licensing

Marchese D.L. 1994 *Business Licensing Agreements*, Longman (London) ISBN 0 85121 6587

Melville L.W. 1992 *Forms and Agreements on Intellectual Property and International Licensing* (3 volumes updated regularly), Sweet & Maxwell Limited (London) ISBN 0 421 05300 2

Mendelsohn M. and Bynoe R. 1995 *Franchising*, Sweet & Maxwell Limited (London) ISBN 0 851 21747 8

Pratt J.H. 1990 *Franchising – Law and Practice*, Sweet and Maxwell (London) ISBN 0 421 40731

Richards J. 1988 *Legal Aspects of Introducing New Products to the United States Market*, Kluwer (Deventer, The Netherlands) ISBN 90 6544 292 8

Technology Transfer Practice in Europe 1994 (two volumes), TII, Luxembourg

Author's note

Textbooks on designs, copyright and trade marks will require revision leading to new editions being published in order to take account of recent changes in the relevant laws in various parts of the world. The reader is referred to the professional publishing houses for details of any new editions of the following books:

Garnett K. and Davies G. 1998 *Copinger and Skone-James on Copyright*, Sweet and Maxwell (London) ISBN 0 421 58910 8

Laddie H., Prescott P. and Vittoria M. 1998 *The Modern Law of Copyright and Designs*, Butterworths (London) ISBN 0 406 90383 2

Gyngell J. and Poulter A. 1998 *A Users Guide to Trade Marks – the New Law*, Butterworths (London) ISBN 0 406 89594 5

Licensing matters are fully discussed in *LES Nouvelles*, published quarterly by the Licensing Executives Society International, and the journal merits regular reading by all interested in licensing.

Annexe 2: EU competition law and restrictive clauses in licensing agreements

Block exemption

The parties to all licences of intellectual property rights granted in the EU must determine whether the licence contains any clauses which may restrict competition and infringe Article 81(1). As indicated above, many will contain such clauses. Such agreements will therefore require exemption if they are to be enforceable in their entirety.

The block exemption which currently applies to intellectual property licences is regulation 240/96, the technology transfer regulation. If an intellectual property licence contains anti-competitive restrictions, the parties should ascertain whether the technology transfer block exemption applies. If the licence falls outside the scope of the block exemption, the parties may seek an individual exemption under Article 81(3) or attempt to redraft the licence, to bring it within the scope of the block exemption or to remove the restrictions.

The technology transfer block exemption applies to patent and/or know-how licences and to licences of other intellectual property rights which are ancillary to a patent and/or know-how licence. The provisions of the technology transfer block exemption are also useful in assessing which clauses the Commission will permit in licence agreements to which the block exemption does not apply, for example pure copyright or trade mark licences. Strictly speaking, such licences which contain anti-competitive clauses infringe Article 81(1) and an individual exemption must be sought: no block exemption exists for copyright (including computer software), design right or trade mark licences.

Exempted restrictions

Article 1 of the technology transfer block exemption includes a list of restrictions in respect of which exemption is granted:

- The grant of an exclusive licence for a particular territory;
- A prohibition on the licensee exploiting the technology in territories reserved to the licensor or to other licensees;
- An obligation on the licensee not to pursue an active sales policy in territories reserved to other licensees or the licensor or to accept unsolicited orders from customers in territories reserved to other licensees (known as 'passive sales');
- A prohibition on the licensor exploiting the technology itself in the licensed territory;
- An obligation on the licensee to use the licensor's trade mark or get up; and
- An obligation on the licensee to limit production of the licensed products to the quantities it requires in manufacturing its own products and to sell the licensed product only as an integral part of those products.

The permitted duration of the exemptions listed above depends upon the type of technology licensed:

- **Pure know-how licences**: For pure know-how licensing agreements, the maximum permitted duration of the exempted territorial restrictions is ten years from the date when the licensed product is first put on the market in the EU by a licensee. In respect of passive sales, however, the maximum permitted duration of the exemption is only five years from such date. The exemption extends only for so long as the know-how remains secret and useful to the licensee.
- **Pure patent licences**: The territorial exemptions are granted for so long as the licensed product is protected by parallel patents in the relevant territories. Again, the maximum permitted duration in respect of passive sales is five years from the date when the licensed product is first put on the market by a licensee.
- **Mixed patent/know-how licences**: For mixed agreements, the duration of the territorial exemptions in respect of know-how will be the longer of ten years or the time for which 'necessary' patents still subsist in the relevant territory.

Permitted restrictions

Article 2 of the block exemption contains a list of clauses which the Commission does not regard as being restrictive of competition but which it exempts, just in case. These provisions are known as the 'white list' and include the following:

- An obligation on the licensee to maintain know-how in confidence;
- An obligation on the licensee not to sub-license or assign the licence;
- A post-term use ban for so long as any know-how is still secret or a licensed patent still in force;
- An obligation on the licensee to grant back licences to the licensor in respect of improvements or new applications of the licensed technology, as long as such obligation is mutual and that, in the case of improvements which can be separated from the underlying technology, such licence is not exclusive;
- An obligation on the licensee to observe minimum quality specifications (so long as these are necessary for a technically proper exploitation of the technology or to ensure that the product conforms with minimum quality specifications);
- An obligation on the licensee to assist the licensor in the enforcement of its intellectual property rights;
- An obligation on the licensee to continue paying royalties beyond the life of the relevant patents in order to facilitate the licensee's payment or after any know-how has become public;
- An obligation on the licensee to use the licensed technology only in one or more specified technical fields of use or in one or more product markets;
- An obligation on the licensee to pay minimum royalties or to manufacture a minimum quantity of the licensed products;
- An obligation on the licensor to grant the licensee any more favourable terms than may subsequently be granted to another licensee;
- An obligation on the licensee to mark the product with the name of the licensor or the details of the licensed patent;
- A prohibition on the use of know-how by the licensee to construct facilities for third parties;
- A right for the licensor to grant a restricted licence to a licensee to provide a particular customer with a second source of supply within the territory;

- A right for the licensor to oppose the exploitation of the technology outside the licensed territory;
- A right for the licensor to terminate the agreement if the licensee challenges the validity or necessity of the patents or the secrecy of the know-how;
- An obligation on the licensee to use its best endeavours to manufacture and market the licensed product; and
- A right for the licensor to terminate the licensee's exclusivity if the licensee starts to compete with the licensor.

Provisions which are not exempt

There are certain provisions which should not be included in a technology licensing agreement without careful consideration. These provisions are set out in Article 3 and are known as the 'black list'. The inclusion of any of these provisions in a licence will mean that the technology transfer block exemption regulation will not apply. In addition, a licence which contains a black-listed provision is unlikely to receive an individual exemption. The black-listed provisions are as follows:

- A restriction on either party in respect of the prices it can charge or in respect of its discounting policy;
- A restriction on either party from competing with the other or from developing, producing or distributing competing products;
- A requirement on either party to interfere with the possibility of parallel exports;
- Where the licence is between competing manufacturers, a restriction on either party within a field of use or product market as to the customers it may serve;
- The imposition of quantity limits, other than those expressly permitted under the block exemption;
- An obligation on the licensee to assign improvements to the licensor;
- The continuation of exempted restrictions for a period beyond that permitted under Article 1, either in separate agreements or through the automatic prolongation of the initial duration of the agreement by the inclusion of any new improvements.

Annexe 3: Basic clauses in a Heads of Agreement

Heads of Agreement for a Licence

Between

ABC inc (Licensor)

And

XYZ Ltd (Licensee)

Without prejudice to the final agreed terms of a full licence agreement:

1. Licensor grants to Licensee a **NON-EXCLUSIVE LICENCE** under the Patent Rights (PCT/GB9X/XXXXXX).

2. **TERRITORY**:

3. LICENCE ISSUE FEE: £XXXXXX

The Licence Issue Fee is payable upon signature of the Licence and is non-returnable under all circumstances and is non-creditable against any other payments due under the full Licence Agreement. For UK licensees Value Added Tax is payable in addition on the Licence Issue Fee at the appropriate rate ruling on the effective date of the full Licence Agreement.

4. **ANNUAL LICENCE MAINTENANCE FEE:** £XXXXXX

The Annual Licence Maintenance Fee is payable beginning with the first anniversary of the effective date of the Licence Agreement, and on each subsequent anniversary thereafter until the date of the first sale of a Licensed Product upon which earned royalties are payable. It is nonreturnable and not creditable against any other payments due under the Licence Agreement. For UK licensees Value Added Tax is payable in addition on the Annual Licence Maintenance Fee at the appropriate rate ruling on each anniversary of the effective date of the full Licence Agreement.

5. **ROYALTY BASE**:

6. **ROYALTY RATE**:

7. **MINIMUM ROYALTIES** (after first use/sale):

Schedule: Year Annual Minimum Royalty Due

8. **DILIGENCE REQUIREMENTS**:

Signed: for and on behalf of

- (LICENSOR) -

Date:

Signed: for and on behalf of

- (LICENSEE) -

Date: