



A BULLETIN  
FROM  
TIFAC

# INTELLECTUAL PROPERTY RIGHTS (IPR)

VOL 5 NO. 3 MARCH, 1999

## A Patent in E-Commerce

Ensuring and enforcing intellectual property rights in the e-commerce environment is a topic of global interest today. Both WIPO and WTO have been looking at this subject matter for some time. IPRs in e-commerce would not be monolithic in nature but multiple IP rights will have to be used for protecting an inventive work. Although, there is no global agreement on what kind of protection would be best suited, companies have started protecting their inventions/methods for smooth running of e-commerce through patents in USA. We present a case study covering a US patent (Patent No. 5,794,207) awarded in August 1998 to Walker Asset Management Limited Partnership for a method and apparatus for cryptographically assisted commercial network system designed to facilitate buyers driven conditional purchase offers. The present invention allows the buyers and the sellers to transact with each other through a third party in between called the central controller. The method and apparatus of the present invention have applications on the internet as well as conventional

communication systems such as voice telephony.

## Background and Prior Art

Most of the systems representing buyer-seller protocol are seller-driven in the sense that they focus on the methods and processes available to the seller, allowing him to price, or configure goods and services more effectively. Stores, catalogues, classified advertisements, telemarketing, auction houses, even on-line computerised air reservation system such as SABRE are all seller-driven. Most goods and services sold in retail fall under a seller-driven system where a seller sets a price and the buyer decides whether or not to accept that price. Other commerce systems are exchange driven. These systems, such as NASDAQ or the New York Stock Exchange (NYSE), match buyer and seller by offering an efficient, fair and orderly marketplace. They favour neither buyers nor sellers but simply effectuate communication that allow for the matching process to take place. An example of an automated exchange driven commerce for trading futures is disclosed in US Patent No. 4,903,201.

As commerce seeks to utilize the inherent advantages of the internet, many types of commerce systems, such as malls, catalogues and auction houses are being implemented on the internet. These approaches generally seek to create better seller or exchange driven systems whereby the sale of goods and services is made more efficient. In a buyer driven system, buyers find sellers; classified advertisements like 'wanted to buy' would fall under this category. These are addressed to a large number of sellers. However, a buyer, specially an individual buyer may find it very expensive to advertise all his/her requirements to be met by the sellers. Certain buyer driven systems do exist such as 'tenders' notified in newspapers where a buyer (government, company, institution) publishes an offer for reward. Buyer driven systems have not become popular even with the advent of e-commerce as buyers do not want to be inundated with numerous offers from potential sellers, many of whom may be marginal or unqualified.

Currently there are 'bulletin board' type sites on the internet, where buyers can post their

*Inventions must be novel, non-obvious and useful for being patentable*

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### **A Patent in E-Commerce**

requirement at a little or no cost. In practice this process has been found ineffective because potential sellers do not frequently visit bulletin board sites. Further, sellers are deterred from using such a process because there is no guarantee of the authenticity of the requirements posted on a bulletin board, the cost of negotiating with individual custom may be too high and it is difficult to enforce any agreement (include payment guarantee). Additionally, bulletin boards are scattered all over in the internet making it difficult for sellers to find out buyers' requirements. Further, the requirements are posted in a variety of formats, and varied terms and conditions and language styles are adopted. Sellers must spend a large amount of time and money to simply understand the prospective buyer's needs and the legal ramifications of the language used in the proposal.

Accordingly, there is a need for a centralized buyer driven system of bilateral electronic commerce capable of being utilized by even small consumers to communicate their purchase needs globally to potential sellers. Such systems do not exist today. A key element necessary to achieve a critical mass of seller participation is the seller's ability to bind a buyer to a legal contract under the terms of the buyer's posted offer.

Electronic data interchange or EDI provides that one party can transfer information and legally relevant documents electronically to another. However, this system

has not been used for global non-personal buyers driven offer. Also, the Statute of Frauds Signature requirement leaves ambiguity about the legality of the EDI-generated contracts. The signature requirement under the statue has not been suitably addressed on the EDI system nor is the requirement of 'writing' satisfied. A US Patent No. 5,191,613 has been granted that utilizes digital signatures to authenticate electronic contracts. The present invention provides for a system in which there is a third party to serve as an arbitrator to resolve contract disputes between buyers and sellers, establish standard protocols, formats, terms and language to be used in buyers offers and then make it easier for sellers to understand and assess individual offers. The system also allows the seller to receive due payments in time and allows for delivery of digitally based products such as certificates of insurance from the seller to the buyer according to the terms of the buyer's purchase offer and the cryptographic validation of such delivery. It is the object of this invention to set forth a system of bilateral buyer driven e-commerce that offers the capability for individual buyers to issue authenticated messages which contain the terms of a purchase offer.

### **Summary of the invention**

The present invention provides a method and apparatus for prospective buyers of goods or services to communicate a binding purchase offer globally to potential sellers, for sellers conveniently to search for relevant buyer purchase offers, and sellers to bind a buyer

to a contract based on buyers purchase offer. Communications between buyers and sellers are conducted using an electronic network and central controller. A buyer accesses the central controller located at a remote server and then creates a conditional purchase offer (CPO) by specifying the subject and description of goods and other conditions, if any. Each buyer wishing to access the central controller will have a user identification.

Before communicating the CPO to potential sellers, the central controller authenticates the buyer's identification against a buyer database. The central controller may require that the buyer provides a credit card number and ensure that the buyer has sufficient credit available to cover the purchase price. The central controller then assigns a unique tracking number to the CPO and globally displays the CPO. If, after viewing a particular CPO, a potential seller wishes to accept the CPO, the seller communicates its intent to the central controller which authenticates the identity of the seller and his capacity to deliver the goods. If the seller accepts the CPO, a unique tracking number is assigned to seller's acceptance which is then stored in a database. The central controller manages the payment system between the buyer and the seller automatically, through credit cards, personal cheques, electronic fund transfer and digital cash. A provision for making 'counter offer' also exists for seller to offer something different from the CPO. Cryptographic protocols

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*Do not publish your invention without first filing a patent application.*

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### A Patent in E-Commerce

are used to authenticate the identity of buyers and sellers and verify their integrity. Using cryptography and biometrics, the central controller can make it significantly more difficult for unauthorised persons to tamper with the system by passing themselves off as legitimate buyers or sellers. (This may become crucial in case of large or/and strategic purchases). The encryption may be implemented with an algorithm such as DES (US Govt. standard specified in FIPS PUB 46) or with any of several algorithms known in the art. Alongwith encryption the technique of fingerprint verification can also be used. The anonymity so provided would be liked by many buyers and sellers who do not want to disclose their identities to general public. For further strengthening of the system and to minimize tampering, one of the embodiments divides the central controller into three components embodied in three different servers namely, an operations server, a trusted server and a bonding agency. The trusted server authenticates the identity of buyers and sellers; the bonding agency verifies their ability to pay or deliver goods and the operations server posts the CPO.

A conventional personal computer, e.g. pentium 100 MHz or computer workstation with sufficient memory and processing capability can be used as central controller. An MC68HC16 micro-controller or its equivalent may be used as a cryptographic processor. This micro-controller utilizes 16-bit multiply-and-accumulate instructions in the 16 MHz configuration and requires less than one second to perform a 512 bit RSA private key operation. (Readers may recall PFC has published a case study on the patent related to RSA code in Vol 3 No 12, December 1997 issue of the IPR bulletin). It would be seen that most of the hardware utilized in the invention is available in the market.

Some examples of applications of this patented invention are:

#### CPO : Airline tickets

Four tickets needed

From Chicago, O'Hare or Midway to Phoenix.

Leaving on April 12 or 13.

Returning on April 18 or 19.

Any of the six largest carriers acceptable.

Change of planes is acceptable if layover is less than 2 hours.

I'll bind at \$180 per ticket, excluding text.

#### CPO : New car purchase

1997 Ford Taurus

Must be in dealer stock

GL package w/air conditioning

AM/FM/Cassette(Stock # 1224-099)

May have other options already installed

Can be white, tan, green or maroon

Must have 100 miles or less, never titled.

No dealer demo cars

Delivered to me no later than Jul 15. 1996

Loan pre-approval: Chase Manhattan #1220-99887 AD-21

I'll bind at \$21,350

#### Claims

The patent has 44 claims but only some claims are given here:-

1. A method for using a computer to facilitate a transaction between a buyer and at least one of sellers, comprising:

in putting into the computer a conditional purchase offer which includes an offer price;

inputting into the computer a payment identifier specifying a credit card account, the payment identifier being associated with the conditional purchase offer;

outputting the conditional purchase offer to the plurality of sellers after receiving the payment identifier;

inputting into the computer an acceptance from a seller, the acceptance being responsive to the conditional purchase offer; and providing a payment to the seller by using the payment identifier.

2. An application for facilitating a transaction between a buyer and at least one seller comprising :

a storage device;

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### Update on Patents in Quantum Dots

PFC keeps tracking the patent scenario in the area of advanced sciences and technologies. PFC had published a brief global picture of patenting in quantum dots in Vol.3 No.1, January 1997 issue of this bulletin. The earlier study covered the patents issued in this area by the United States Patent and Trademark Office (USPTO) upto December 1996 and patent applications filed at European Patent Office (EPO) and through Patent Co-operation Treaty (PCT) upto November 1996. This is an update on the earlier and covers 47 patents issued by USPTO and 28 patent applications filed at EPO and PCT till December 1998.

Quantum dots are nanometer size 3-dimensional semiconductor structures involving 1000 to 100,000 atoms. The dimensions of a quantum dot may range from 20-100 Å. This represents the most rapidly developing area of current semiconductor research. They promise properties that could be harnessed for a range of electronic and optical applications. Arrays of densely packed dots could form a substrate for computers. Dots could also constitute materials capable of absorbing and emitting light at whatever set of wavelengths their designers specify or could even serve as the basis of semiconductor lasers more efficient and precisely tuned than any now in existence.

The number of patents granted in the last two years has gone up substantially. As compared to 22 patents issued up to 1996, the USPTO granted 25 patents in just the two years namely 1997 and 1998. However, the same trend is not observed from the patent applications filed in the EPO and PCT.

Year	89	90	91	92	93	94	95	96	97	98	Total
Patents issued by USPTO	0	0	0	1	5	6	2	8	15	10	47
Patents filed at EPO and PCT	1	0	0	1	3	4	3	8	3	5	28

Out of the 47 patents granted by USPTO since 1989, 45 patents are owned by 23 companies while 2 are held by individuals. A list of companies holding more than one patent is given below:-

Company name	Patents granted since 1989	Patents granted during 1997 and 1998
Sony Corporation, Japan	8	6
IBM Corporation, USA	8	1
Texas Instruments Inc, USA	6	3
Matsushita Electric Industrial Corp, Japan	3	1
Kabushiki Kaisha Toshiba, Japan	2	2

Sony Corporation's patents relate to methods of manufacturing quantum device, quantum memory, field effect transistor (FET) having channel with quantum boxes, charge transfer device comprising a quantum wire and quantum dot tunnel devices. IBM Corporation's patent of 1998 relates to nano-structure memory device. Texas Instruments has three patents relating to quantum logic cell, fabrication of lateral resonant tunneling structure and quantum effect switching device. It is interesting to note that Matsushita Electric Industrial Company's patent is on single electron transistor, which can be operated at room temperature. New entrants in the game during 1997 and 1998 were Electronics and Telecommunication Research Institute, Motorola Inc, Siemens Aktiengesellschaft, University of Notre Dame Du Lac, Fujitsu Ltd., Max-Planck Gesellschaft Zur Foerdrey der Wissenchattan, the University of New Mexico, Xerox Corporation, Kabushiki Kaisha Toshiba, Shimadzu Corporation, NEC Corporation, Fuji Photo Film Co. Ltd. and Regents of University of Colorado. Most patents issued during the period from 1997 to 1998 are for fabricating and manufacturing quantum dots and quantum devices.

Out of a total of 28 patent applications filed at EPO and PCT, only eight applications were filed during the years 1997-1998. List of the companies filing more than one patent is given below.

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**Update on Patents...**

**List I**

<b>Company name</b>	<b>Applications filed since 1989</b>	<b>Applications filed during 1997 and 1998</b>
Matsushita Electric Industrial Co Ltd, Japan	5	3
ISIS Innovation Ltd, UK	4	2
The Regents of University of California, USA	3	0
British Telecommunications, UK	2	1
Seimens Aktiengesellschaft., Germany	2	1
Hitachi Europe Ltd, Japan	2	0
Max Planck Gesellschaft Zur Foerdrey der Wissenchattan, Germany	2	0

**Patents granted by USPTO (Patent numbers given in brackets) in 1997 and 1998.**

1. High speed semiconductor phototransistor (5844253)      Electronics and Telecommunications Research Institute
2. Electrically confined VCSEL (5848086)      Motorola Inc
3. Microelectronic component and process for its production (5828076)      Siemens Aktiengesellschaft
4. Charge transfer device (5828090)      Sony Corporation
5. Universal quantum dot logic cell (5783840)      Texas Instruments Inc
6. Electrochemical synthesis of quasi-periodic quantum dot and nanostructure arrays (5747180)      University of Notre Dame Du Lac
7. Photo hole burning memory (5734174)      Fujitsu Limited
8. Method of fabricating a compositional semiconductor device (5714765)      Max-Planck-Gesellschaft zur Foerderung der Wissenschaften e.V.
9. Nano-structure memory device (5714766)      International Business Machines Corporation
10. Method for manufacture of quantum sized periodic structures in Si materials (5705321)      The University of New Mexico
11. Lateral resonant tunneling (5593908)      Texas Instruments Inc
12. Fabrication of quantum confinement semiconductor light-emitting devices (5607876)      Xerox Corporation
13. Field effect transistor having channel with plural quantum boxes arranged in a common plane (5608231)      Sony Corporation

Matsushita Electric Industrial Company Limited has filed two patent applications. One of them relates to fabricating semiconductor micro-needles which constitute a semiconductor apparatus with a high information-processing function and the other relates to two dimensional array of quantum dots formed from metal atom. ISIS Innovation has filed two patents during the years 1997 and 1998 in addition to its two patents which were filed earlier. Both the patents pertain to method of producing metal quantum dots. British Telecommunication has one patent application related to optical fiber with quantum dots. Siemens Aktiengesellschaft has filed patent application for silicon MOS component having surface structure in the gate region. Spectra Science Corporation has filed its first patent in the year 1998 entitled 'Synthesis of metal chalcogenide quantum dots from aqueous media'.

It has been observed, on the basis of the available databases Espace-B at IBM patent site and INPADOC database, that only three patents have been granted so far by the EPO. These patents have been issued to Hitachi Europe Limited, Shimadzu Corporation and ISIS Innovation Limited.

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### Update on Patents...

- |   |   |
|---|---|
| 14. Quantum dot-tunnel device which can be selectively excited by a first light emitting source and the information thus stored can be read with a second light emitting source (5613140) | Sony Corporation                        |
| 15. Quantum dot fabrication process using strained epitaxial growth (5614435)   | Regents of the University of California |
| 16. Manufacturing method of a quantum device (5643828)  | Sony Corporation                        |
| 17. Quantum effect switching device (5646418)   | Texas Instruments Incorporated          |
| 18. Single electron transistor using protein (5646420)  | Matsushita Electric Industrial Co, Ltd  |
| 19. Quantum memory (5663571)  | Sony Corporation                        |
| 20. Quantum dot-tunnel device and information processing apparatus and method using same (5671437)  | Sony Corporation                        |
| 21. Correlation tunnel device (5679961)   | Kabushiki Kaisha Toshiba Kawasaki       |
| 22. Fine pattern forming method and fine pattern device (5683595)   | Shimadzu Corporation Kyoto              |
| 23. Quantum-dot cascade laser (5692003)   | NEC Research Institute Inc              |
| 24. Semiconductor device and method for its manufacture (5701016)   | Kabushiki Kaisha Toshiba Kawasaki       |
| 25. Silicon quantum dot laser (5703896)   | Regents of the University of Colorado   |

### List II

### Patents Filed at EPO and PCT in 1997 and 1998

- |  |  |
|--|--|
| 1. Semiconductor device comprising an aggregate of semiconductor micro-needles (0887866) | Matsushita Electric Industrial Co, Ltd |
| 2. Semiconductor device comprising an aggregate of semiconductor micro-needles (0887867) | Matsushita Electric Industrial Co, Ltd |

- |  |   |
|--|---|
| 3. Quantum dot device (0881691)  | Matsushita Electric Industrial Co, Ltd            |
| 4. Method of producing metal quantum dots (0871557)                          | Isis Innovation Limited                           |
| 5. Synthesis of metal chalcogenide quantum dots from aqueous media (9819963) | Spectra Science Corporation                       |
| 6. Optical fibre with quantum dots (0783784)                                 | British Telecommunications Public Limited Company |
| 7. Method of producing metal quantum dots (9704906)                          | Isis Innovation Limited                           |
| 8. Micro-electronic component and process for making it (0756761)            | Siemens Aktiengesellschaft                        |

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### A Patent in E-Commerce

a processor connected to the storage device;  
a program for controlling the processor;  
the processor operative with the program to receive a conditional purchase offer which includes an offer price;  
receive a payment identifier specifying a credit card account, the payment identifier being associated with the conditional purchase offer;  
make the conditional purchase offer available to the plurality of sellers after receiving the payment identifier;  
receive an acceptance from a seller, the acceptance being responsive to the conditional purchase offer; and  
provide payment to the seller by using the payment identifier.

The invention apparently deals with the system integration of various microcontrollers, personal computers etc. As no disclosure about hardware design per se has been made, there is no invention on this ground. In addition, the patent talks about such devices which are available in the market. The patent also seems to depend heavily on software and databases which also have not been disclosed. It appears to be a very broad patent which may come in the way of market exploitation of similar systems by others. Indian inventors may, however note that they can also protect similar inventions in USA.

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## Trade Mark Annual Report for the Year 1997-98: Highlights

1. A total of 46, 712 applications were filed for trade mark registration in the year 1997-98 as against 43,234 applications filed during 1996-97, indicating an increase of 8%. 46,284 applications were for registration in part 'A' of the Register and 428 were for registration in part 'B' of the Register.

2. The number of applications filed by Indians decreased from 38,192 to 37,918, a decrease of about 0.7%; whereas those filed by foreigners increased by 74% from 5042 to 8784.

3. A breakup of applications filed in 1997-98, is given below. The types of marks are also mentioned.

Trade Mark	1997-98
Word Marks	28,457
Device Marks	9,732
Numerical Marks	732
Letter Marks	1338
Letter and Numeral Combination Marks	6453

4. The Class 5 products (pharmaceutical, veterinary and sanitary substances etc) were once again at the top with their share of 15.24% of the total applications filed for registration. The top 5 Classes receiving the highest number of applications are given below:

Class	No of applications filed
Pharmaceutical, veterinary and sanitary substances (Class 5)	7120
Clothing including boots, shoes and slippers (Class 25)	5141
Scientific, nautical, surveying and electrical apparatus, etc. (Class 9)	3511
Coffee, tea, cocoa etc. (Class 30)	3375
Paper and paper articles (Class 16)	3344

5. 806 notices of opposition to Registration of Trade Marks and 71 applications for notification of the Register were filed during 1997-98.

6. A total of 4120 trade marks were registered in 1997-98 as against 4686 in 1996-97 in part 'B' of the register.

*Source : 39<sup>th</sup> Annual Report on Trade Marks for the year 1997-98*

### International News

A patent has been obtained by two students and a professor of University of Tuba for determining how high someone can jump. The device is a nine pound, brief case size, computer controlled jumping meter. It consists of electrical switches attached to a timer, which is in turn attached to a microprocessor and a display screen. The height to which the person jumps is calculated mathematically after taking into account the readings of the timer before and after the jump.

**(WISTA Intellectual Property, Vol 2 No 13, Feb 99)**

Two US patents (Pat No 5, 849, 571 and Pat No. 5, 849, 572) have been granted for a gene therapy which controls pain. The therapy has been experimented on mice at the University of Pittsburgh. The therapy may provide relief to patients suffering from pain associated with cancer, arthritis, angina and peripheral neuropathies. Narcotics - based medications given to the patients may cause confusion and lethargy, may be addictive and are not always very effective. The mice were treated with a herpes virus vector containing the gene encoding preproenkephalin. When processed in the body, this protein is processed into enkephalin peptides. The enkephalin acts on C-type neurons, which transmit information felt as slow, burning pain by humans. The viral vector becomes latent in the nervous system so that it remains inactive but the enkephalin gene remains active.

**(Genetic Technology News, Vol 19 No 12, Mar 24, 99)**

Persons wishing to have monthly update on the decision of

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## Patents for Opposition

The following patent applications have been accepted by the Patent Office and published in the Gazette of India. These can now be opposed by filing opposition applications within a period of four months from the dates given. Six digit numbers allotted after acceptance by the Patent Office are given before the applicant names and patent application numbers given in brackets. Names of the branches of the Patent Office are denoted in the application number, e.g. 'Bom' for Bombay branch. An opposition application should be submitted at the appropriate office where the concerned application was originally filed.

### PATENT APPLICANTS

### INVENTION

#### A. 6 Feb, 1999

182211. Eco Innovations Ltd, UK (392/Cal/93)	A building and a method of constructing the same.
182212. Siemens Aktiengesellschaft, Germany (215/Cal/94)	Method for work hardening by rolling a component.
182213. Brojo Renu Ganguly, India (668/Cal/94)	An improved and modified method of producing a wear resistant vee assembly for rails.
182214. Bal Krishna Sinha, India (1039/Cal/94)	Vacuum engine with piston cylinder arrangement.
182215. Euroceltique SA, Luxembourg (1452/Cal/96)	A process for the preparation of a solid controlled release oral dosage form.
182216. Madan Mohan Telikicherla, USA (147/Cal/96)	A lower limb prosthetic device.
182217. Kaneka Corporation, Japan (1754/Cal/96)	Process for producing high purity n-(d-oc-methyl-b-acylthiopropionyl) l-proline.
182218. Grunenthal GmbH, Germany (45/Cal/97)	A method of separating the recemate of tramadol.
182219. Kurary Co Ltd, Japan (276/Cal/97)	Process for the preparation of 2-chloro-5-chloromethyl-1 3-thiazole.
182220. General Clutch Corporation, USA (567/Cal/94)	A friction hinge assembly.
182221. Sree Chitra Tirunal Institute for Medical Sciences and Technology, India (718/Mas/91)	A process for the preparation of hydrogel beads from crosslinked poly (methul methacrylate) microspheres.
182222. Shell Internationale Research Maatschappij B V, Netherlands (12/Mas/92)	A process for the preparation of a cyclone finishable polymeric viscosity index improver.
182223. Krupp Widia GmbH, Germany (330/Mas/93)	A process for the manufacture of composite compact bodies of carbide steel ceramic especially sintered ceramic or cermet substrate element or a substrate element/layer made of diamond or nickel or cobalt base alloy.
182224. Gersan Establishment, Liechtenstein (374/Mas/93)	Apparatus for detecting diamonds in a rock sample.

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### International News

the courts relating to intellectual property issues, mainly in UK and Europe, may subscribe to a monthly journal, Intellectual Property Decisions. This monthly journal contains information on legislation and regulations, new and pending cases, division and judgements of the UK and European Patent Offices, House of Lords and the High Court, the UK Design Registry, UK Trade Marks Registry and Copyright Tribunal. For details you may contact at the fax No. 01787 881127 or Tel No 01787 467267

The Japanese Ministry of International Trade and Industry (MITI) and the Patent Agency (PA) are determined to commit themselves to a genome patent war with the US. Till now US has been acting on its own authority regarding genome patents. MITI and PA intend to continue the talks with the US and Europe in a bid to harmonize the genome patent system of the three economic blocks. The Japanese decision mainly stems from the USPTO move of granting a patent to an expression sequence tag (EST), a fragment of cDNA. There is a debate going around the globe that EST being merely a fragment should not be covered by a patent, as it will hinder sound and free genome research. However, many companies in the US have built up libraries with 50,-60,000 ESTs and such companies have been increasingly filing applications for patent approval.

#### (COMLINE, March 99)

The Japanese Patent Office (JPO) has taken a new initiative to streamline the complex Japanese patent system. The streamlining

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182225. Institute Francais Du Petrole, France (378/Mas/93)	Device for controlling the pneumatic injection of a carbureted mixture in a two stroke internal-combustion engine.
182226. DSM N V, Netherlands (454/Mas/93)	Process for the preparation of a mixture of cyclohexyl hydroperoxide cyclohexanol and cyclohexanone.
182227. BASF Aktiengesellschaft, Germany (476/Mas/93)	A process for preparing silver containing catalyst supported on alumina.
182228. Courtaulds Packaging Inc, USA (526/Mas/93)	Thermoplastic composite layered tube and method of making same.
182229. Rieter Ingolstadt Spinnerimas-Chinenabu Aktiengesellschaft, Germany (577/Mas/93)	Open end spinning apparatus.
182230. Shuichi Sugita, Japan (597/Mas/93)	Method of producing active rice husk ash.
<b>B. 13 Feb, 1999</b>	
182231. L-Z-Boy Inc, USA (635/Cal/94)	Reclining chair.
182232. Measurement Technology International, USA (748/Cal/94)	Fluid flow meter.
182233. Cirrus Logic Inc, USA (773/Cal/94)	A method of forming a non-volatile flash memory cell.
182234. SKF Textilmaschinen-Komponenten Gmbh, Germany (1020/Cal/94)	Drawing arrangement for spinning frames.
182235. Donald Lee Mingos, USA (1023/Cal/94)	An out sole for a shoe.
182236. Thomson Consumer Electronics Inc, USA (1059/Cal/94)	An apparatus for the formation and transmission of television program information.
182237. Wires & Fabrics (SA) Ltd, India (1086/Cal/94)	A triple layer fabric for paper making machine.
182238. Hoechst Aktiengesellschaft, Germany (2/Cal/95)	A process conducted continuously or batchwise for producing an aminated cotton fiber.
182239. Bhaswar Chatterbhaswar Chatterjee & Sampa Chatterjee, India (3/Cal/95)	A device for advertising.
182240. Rapid Building Systems Pty Ltd, Australia (168/Cal/95)	An apparatus and method for the manufacture of building panels.
182241. Hindustan Lever Limited, India (488/Bom/94)	A packet comprising an envelope and a drawstring or thread for squeezing the contents of the packet.
182242. Hindustan Lever Limited, India (498/Bom/94)	Fabric conditioner composition.
182243. Finolex Industries Limited, India (616/Bom/94)	Fitment for fluid pipe lines.

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### **International News**

process includes a system of information exchange between the JPO and the Japanese courts to facilitate litigation as well as new evidentiary requirements for defendants in infringement suits. Japan has also made changes to the penalties imposed on parties found guilty of patent infringement. A new maximum fine of 150 million yen for the patent infringers has been announced and a new ruling allows the judges to raise the amount of damages according to the individual circumstances.

**(Patent World, Dec 98/Jan 99, Issue 108)**

### **Domestic News**

Central Mining Research Institute (CMRI) has filed a patent for a composition useful for safe blasting of coal in underground mines and other excavation work. The patent also covers the process for preparing the said composition.

**(CMRI Newsletter, Vol 8 No 4, Oct-Dec 98)**

Two nurserymen, G. Parthasarathy (73) and his son P. Mukundan (50) running a very well known nursery in Bangalore have obtained US patents for two ornamental foliage plant varieties. These men running the KSG Farm and Nursery have developed varieties called Aglaonema (common name Chinese Evergreen), hybrids of exquisite shape, colour and form named 'Jewel of India' and 'Emerald Star'. Jewel of India variety is suitable for 6 to 10 pots while Emerald Star which is a large leafed plant is best suited to 10 pots and larger. Both the varieties show good plant life in indoor areas, show excellent tolerance to cool temperatures and

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*Inventions must be novel, non-obvious and useful for being patentable*

182244. Pramod Vora Vikram, India (63bom/95)	Touch responsive electric power controller.
182245. Bhabha Atomic Research Centre, Department of Atomic Energy Government of India (208/Bom/95)	A process for the preparation of a pectinolytic enzyme complex comprising poly-galacturonase pectin esterase and pectin lyase from a new microbial strain of aspergillus niger van tiegh.
182246. Chinese Petroleum Corporation, Taiwan (273/Bom/95)	Semi-synthetic two-stroke engine oil-composition.
182247. Star Spin & Twist Machineries Ltd, India (292/Bom/95)	An improved spindle & bolster assembly of cabler machine from a bigger package for cabler yarn for carpet/textile industries.
182248. Star Spin & Twist Machineries Ltd, India (293/Bom/95)	A cabler assembly for two for one twister.
182249. Star Spin & Twist Machineries Ltd, India (294/Bom/95)	An improved brake assembly of cabler machine for carpet/textile industries.
182250. Star Spin & Twist Machineries Ltd, India (295/Bom/95)	An improved brake assembly of cabler machine for carpet/textile industries.
<b>C. 20 Feb, 1999</b>	
182251. Combustion Engineering Inc, USA (678/Cal/93)	An apparatus more specifically a tube stop structure for use with a tube and fin furnace wall.
182252. Bridge & Roof Company (India) Ltd, (357/Cal/92)	An improved process of storing mature vegetables fruits and the like plant materials for preventing deterioration.
182253. Copeland Corporation, USA (274/Cal/94)	A scroll compressor.
182254. Fabritex SRL, Italy (550/Cal/94)	Method and apparatus for joining two edges of a knitted tubular article upon completion thereof.
182255. The Babcock & Wilcox Company, USA (759/Cal/94)	A system for protecting from damage the material of a gas-gas heater used for treatment of flue gas.
182256. Maschinenfabrik S Rocksted GmbH, Germany (835/Cal/94)	Multi-screw continuous mixing machine for plasticizable compounds.
182257. Chaun-Tien Cheng, Taiwan (913/Cal/94)	A reed frame structure for magnetically propelled weaving machines.
182258. Siemens Aktiengesellschaft, Germany (998/Cal/94)	Low voltage power circuit-breaker having a switching chamber.
182259. V Govinda Rajulu, India (100/Cal/94)	A jumper clamp for joining high tension conductors.
182260. Jean Marc Masse, France (91/Cal/95)	Air /fuel mixture supply device for a two stroke internal combustion engine.

*Contd from...9*

**Domestic News**

display few disease or insect problems. KSG Farm and Nursery is now also applying for patents in Europe, Australia, South Africa and other countries.

**(Agriculture & Industry Survey, Vol IX No 3-4, Mar/Apr 99)**

According to the Annual Report of Department of Space, Government of India for the year 1998-99, three patent applications have been filed during the year. These include an improved process of gold plating on magnesium alloys substrates, a process of black anodising on magnesium alloys and a process of black chromate coating on magnesium-aluminium alloys. An application has been filed for copyright on 'Geoimage Software'.

Foundation for Innovation and Technology Transfer (FITT) has filed 29 patent applications starting from the year 1991 till 1998. The patent applications relate to a variety of areas such as chemicals, opto-electronics, medical, microbial processes, etc. The applications filed in the year 1998 have been listed below :

1. An improved process for preparation of ultra high molecular weight poly (oxyethyleneoxyterphthaloyl) and products thereof. (303/Del/98)
2. Degumming of silk with a fungal protease. (2493/Del/98)
3. Method of manufacturing a fiber array block for integrated optics circuits & products thereof. (2894/Del/98)
4. Process for electrodeposition, dyeing of textile materials and products thereof (2954/Del/98)
5. Process for development of antimicrobial sutures & products thereof (2999/Del/98)
6. Process for development of

*Contd on...11*

*Do not publish your invention without first filing a patent application.*

**D. 27 Feb, 1999**

182261. Donald E. Burg, USA (03/Cal/93) Multiple hull air ride boat.
182262. Matsushita Electric Industrial Co Ltd, Japan (532/Cal/94) Radio communication system.
182263. Siemens Aktiengesellschaft, Germany (741/Cal/94) Servomotor in particular for a rapid action stop valve.
182264. Pyrotite Corporation, USA (892/Cal/94) Water and fire resistant composition and methods of making products from the same.
182265. Philips Petroleum Co, USA (1005/Cal/94) A method of preparing monovinylaromatic / conjugated diene copolymer.
182266. Helmut Bacher, Austria (1058/Cal/94) Apparatus for processing thermoplastic synthetic plastic material.
182267. Norpharmco Inc, Canada (270/Cal/95) A method for the preparation of a pharmaceutical composition containing a non-steroidal anti-inflammatory agent (NSAID).
182268. Mcneil-PPc Inc, USA (487/Cal/95) Absorbent product configured to conform to body shape.
182269. Hoechst Aktiengesellschaft, Germany (599/Cal/95) A process for the preparation of an isoindoline pigment.
182270. Hoechst Celanese Corporation, USA (2136/Cal/96) Syntheses based on 2-hydroxacetophenone.
182271. Central Power Research Institute, India (342/Mas/93) A process for preparation of capacitor fluid from rapeseed oil.
182272. Drusila Francis, India (609/Mas/93) An improved flushing cistern.
182273. Narayana Thevar Sabapathy, India (622/Mas/93) A device for automatic operation of clutch in automobiles having conventional gear changing mechanism.
182274. Davaluri Crysostham Pradhan, India (645/Mas/93) A method of manufacturing leather.
182275. Kimberly Clark Corporation, USA (714/Mas/93) A durable adhesive-based ink-printed non-woven web.
182276. Japan Exlan Co Ltd, Japan (723/Mas/93) Process for separating purifying and recovering thiocyanate.
182277. Dr Joseph George, India (888/Mas/93) Multilayered rice husk particle board and a method of making the same.
182278. Societe Des Produits Nestle S A, Switzerland (896/Mas/98) A process for preparing a cooked cereal product.
182279. International Business Machines Corporation, USA (690/Mas/94) A computer adapter card.
182280. Bracco International B V, Netherlands (1552/Mas/96) Process for the crystalization from water of ioamidon in a crystalline anhydrous form.

*Contd from...10*

**Domestic News**  
improved antimicrobial sutures & products thereof (3032/Del/98)

7. Process for recovery of vat dyes from effluent containing vat dyes (3623/Del/98)

8. A device for measurement of glass transmission (3583/Del/98)

9. A dual shaft squeeze film damper (3837/Del/98)

10. Intershaft squeeze film damper (3855/Del/98)

FITT also has to its credit 29 copyrights registered for software, circuit design, dyeing process, antimicrobial sutures, etc.

**(FITT Forum, Vol 4 No 2, Nov 98 & Vol 5 No 1, Feb 99)**

The Regional Research Laboratory (RRL), Thiruvananthapuram has won two US patents related to superconducting films. RRL has obtained process and product patents for 60 new materials in electronic ceramics. The new materials are based on rare earth elements, barium, tin, hafnium, zirconium and have potential for extensive applications in high temperature superconductivity, microwave dielectric resonators and many other electronic devices. The scientists have obtained a current density as high as 6000 kilo amperes per square cm of the film at 77 degrees Kelvin. The films developed using these materials could be of use in microelectronics and high temperature superconducting quantum interference devices.

**(The Hindu, 4 Mar 99)**

Madras University's Dr. A. L. Mudaliar Institute of Post Graduate Medical Sciences holds a patent for a plant, Keezhanalli (Phyllanthus Amarus) used to cure the Hepatitis B Virus (HBV) disorder. In case of acute HBV-related jaundice, four weeks of

*Contd on...12*

*Inventions must be novel, non-obvious and useful for being patentable*

## PFC on the move...

### Patent Awareness Workshops

PFC organized its 49th workshop at Saurashtra University Rajkot, Gujarat on March 26, 1999. This was attended by about 100 scientists and technologists, including participants from different industries in the region.



(Workshop at Rajkot)

The 48th workshop was organised on March 22, 1999 in association with the West Bengal State Council for Science & Technology, Calcutta, at North Bengal University, Siliguri, West Bengal. The workshop had a participation of about 60 scientists from the region.

### Patents Filed

One patent application was filed during March 1999. With this the total numbers of patent applications filed through PFC has gone upto 54.

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### Domestic News

Keezhanali treatment can clear the virus. The main advantage of this drug as compared to earlier drugs is that it is more affordable, free of side effects like body pain and hair loss and has a time bound course. The other drugs have to be taken life long.

(The Indian Express, 12 Mar 99)

A project for modernisation of Patents Office at a cost of Rs.75.59 crores to be implemented during the Ninth Plan has been sanctioned by the Government. The project includes setting up of National Patent Office by upgrading the existing office in the National capital, strengthening branch offices, providing trained and qualified personnel, computerisation and infrastructural support, financial and operational autonomy and creation of awareness by organising awareness seminars.

(The Hindu, 13 Mar 99)

The Patents (Amendment) Bill allowing exclusive marketing rights (EMRs) to foreign companies in the drug and agro-chemical sector was passed by the Parliament. It got the Lok Sabha approval on 12th March followed by approval of the Rajya Sabha on the next day.

(The Financial Express, 14 Mar 99)

**Please send us questions and topics you would like to see in the coming issues**

#### *NEXT ISSUE*

- Patent Laws in Norway
- Patents for Opposition
- Case Study

#### Published by: Patent Facilitating Cell (PFC)

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Typeset & Printed by Reliant Print O Graphics, New Delhi-110 020  
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