#### THE MOOD OF THE MUSLIMS

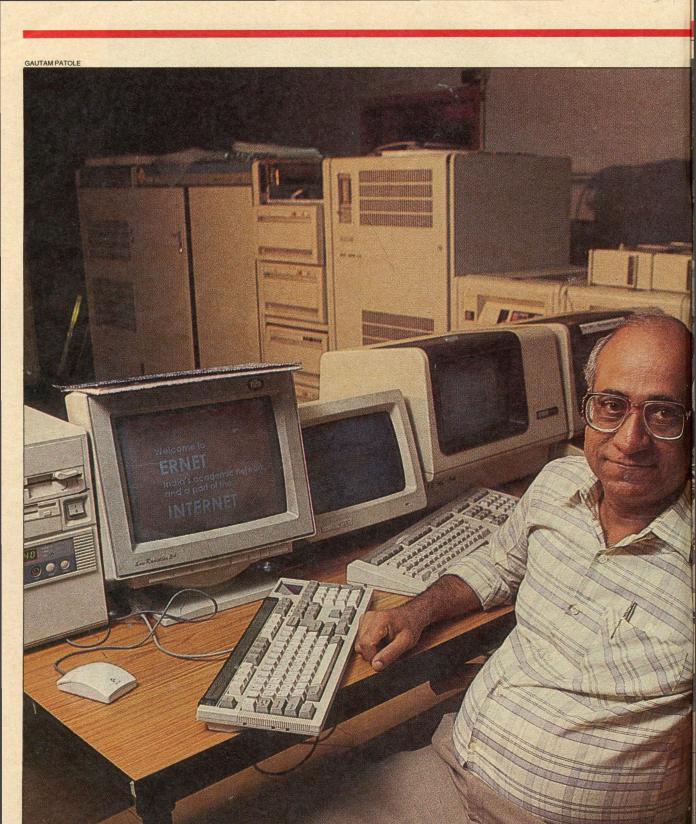
# SINDAY

The whole world opens up as India hooks up to the information highway



CYBERSPACE

PAR GENUS



Dr S. Ramani, who helped instal ERNET, is one of the pioneers of the informat

#### ion infrastructure in India

# The journey through

# CYBERSPACE

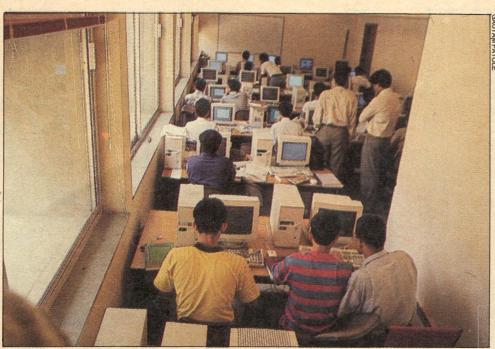
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If you are using the phrase, 'International Information Superhighway' and thinking how erudite you sound, forget it. It's already a no-no, a cliche, a has-been of a catch phrase. How, you blink, did that happen, when you had hardly begun to understand how to spell it? Well, you shouldn't have blinked. That's about how long it takes for a concept to originate, catch on and peter out in cyberspace (soon to be another cliche).

What is cyberspace? It's that invisible realm in which your computer is talking to other computers across the world, and retrieving or sending almost any information anywhere in more than 150 countries quickly, cheaply and reliably. Cyberspace is real time, online communication through high speed data links that criss-cross the globe. It is often referred to as an information highway by fellow travellers and it does resemble a chaotic traffic corridor, where millions of cars speed by, crash, get into traffic jams, but finally reach their destination, either in one piece or completely transformed by the experience.

One major component of cyberspace as it exists today is the Internet, or just the Net. It is a network of millions of computers that can dial up each other through a maze of connected communication technologies. The Net has acquired a sort of suprahuman existence...it is not governed by any country or organisation, it is free (in both senses of the word) and is often thought of as lawless and anarchical. Somehow, it continues to expand, estimated to be doubling (in volume of transactions) every two





Waiting to enter the information highway: there are frequent traffic jams

months. The Net, dubbed the mother of all networks, draws people instinctively to its breast...and then they can't get enough of that 'online feeling'.

In India, the cyber revolution is an idea whose time has come. Thousands of urban Indians are waiting breathlessly for the official policy statement from the Videsh Sanchar Nigam Ltd (VSNL), expected on 15 June.

That has been a long time coming. The government has been dithering over the modalities of offering connectivity to ordinary Indians. It is an open secret that the Department of Telecommunications (DoT) wants to keep exclusive rights to communication distribution. Between DoT and VSNL (the main gateway provider to Internet from India), commercial entities who want an opportunity to compete with government providers, might just be left out in

Says one of the information in In Says Dr S. Ramani. one of the pioneers of the information infrastructure in India, who helped install ERNET (see box) and made it a success, "The regulatory policies concerned with networking are in a state of evolution in India. The telecom regulatory authority of India (TRAI) is being set up. At the moment, fullfledged networking services are not offered by multiple agencies. One can expect that in the course of time, this field will also be thrown open to competition. One would also expect the TRAI to offer a level playing field to all service providers." Fortunately for sumers, this is simply not a technology that can be

lock and put under The irony is that the government has already committed itself to liberalising telephone communications. Once the basic telephone services are open to competition from the private sector, how can it prevent any value-added services from being provided on the same networks? It's like giving guests their dinner and withholding the paan masala.

ERNET itself is facing a cutoff of funds from the government. After years

# **Logging in**

How to get online from India

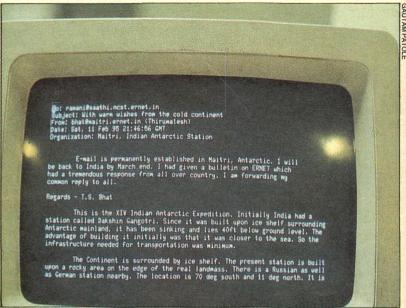
At the moment, there are only four ways to get full international connectivity from India:

Through ERNET, the education and research network, which connects scientific and educational campuses across the country and allows them reasonable access to international databases. Students and professors enjoy unlimited access to the information highway, thanks to ERNET, which was jointly funded

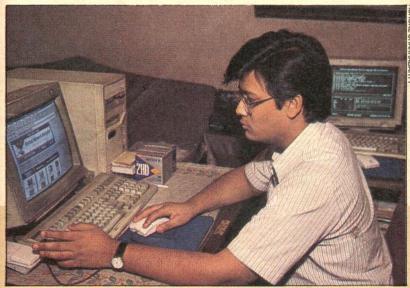


by the United Nations Development Programme (UNDP) and the Government of India. In the next three months ERNET is planning to have 60 online locations, up from less than 15 today. For a short while, ERNET also provided access to commercial entities. That facility has now been withdrawn. The government has decided that ERNET is primarily meant for education and research, not for profit-making.

Through a dedicated satellite link to an offshore computer. Many software companies have their own 64kbps or 120kbps links to the computers of their partners abroad.



A message received over ERNET from the Indian expedition team to Antarctica



Hooking on to Internet: the possibilities are immense

Through this, they could access any online service that is available from the host computer. There are estimated to be 150-200 such point-to-point connectivities from India. Technically speaking, nobody is sure about the legality of accessing Internet in this manner. It only emphasises, however, that this is not a technology that can be locked away.

Through the Software Technology Parks (STPs).

STP-users have point to multi-point access to host computers with Internet connectivity.

Through the VSNL's GPSS, which is an international gateway. Subscribers to DoT's national network, called the I-Net, can get access to Compuserve, an international network. From there, they can easily merge into the international superhighways. However, I-Net is rumoured to be

of educating and training and linking people in the field of academic research, Dr Ramani is naturally sorry to see ERNET's very existence under threat. He is very proud that ERNET has successfully implanted the homegrown university tradition of sharing knowledge into its network. Public domain software, shareware, freeware: these are all terms that imply free access to information, and that's what ERNET has made possible across campuses of India. "No one else is as well equipped to do this as ERNET," says Dr Ramani, adding, "ERNET has its own niche." At the same time, ERNET is quite willing to face competition from market forces. "We will be delighted to take on any competition in this regard," says Dr Ramani confidently. "Anything that does so much for so many people is secure."

hanks to ERNET, the scientific community was the first to go online in India. A decade of networking has inexorably changed the face of academia in India.

Now, Indian researchers are getting used to the idea of downloading specific data on current developments in any field. Now, they are empowered to post their own research findings into the international loop without bureaucratic delays. It has put a new pressure on the academic community to perform. Says Dr Vijay Chandru, who took his doctora-

highly unreliable and subscribers complain of excessive down time.

But where does the common man figure in all this? Nowhere. None of the alternatives currently available allow reasonable access to ordinary citizens. Until the government implements a nodal structure to allow this access, cyberspace will remain an exclusive club, at least in India. Even when VSNL's policy is announced, it is expected that local access would be prohibitively expensive. One government source compared it to allowing competition in the airline sector, but restricting people to government taxis for going to the airport, and charging the same fare as the airfare.

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# Mind your language

The lingua franca of cyberspace

Itrangely enough, the word 'cyberspace' was not found in any dictionary until the early Nineties. It was coined by William Gibson when he wrote Neuromancer in 1984. It caught the imagination of so many people that they are having a great time inventing words with the same etymology to describe the explosion of information in a brave new world. With amazing speed, words like infobahn, infoglut, cybernaut, cyberpunk, newbie and geek - all recently conjured up by electronic wordsmiths - have achieved backdoor entry into the English language.

Not that academics quite like the word cyberspace. They prefer terms like international information infrastructure. But nobody is listening to them anymore than people are speaking the Queen's English. The Net, if anything, has internationalised American English.

When ordinary people gatecrashed into the cosy and exclusive academic club called Internet, it quickly changed from a stuffy, formal, 'send me your research and I'll send you mine' affair into a wild, drunk, casual kind of place. It altered the language of the party and the way people addressed each other. Now you can get away with calling yourself a 'web babe' on your home page. And popular Internet access software like Netscape has really defined the informal culture on the Net. Their icon: 'What's Cool' gives you the latest and the greatest on the Net.

Casual interaction, as typified by Hollywood, is quite definitely the lingua franca of the Net. "Dear Sir" would not go well in cyberspace. Instead, you can blow kisses, raise your eyebrows, get angry, shout and cry on the Internet. Nettiquette is now codified. Many authors have aspired to be the Emily Posts of the Internet. Quickly, considering that Internet in its current form is less

than five years old, people have accepted a mutually beneficial code of behaviour. It's been like reinventing good manners. Of course, there are exceptions — people who use the Net mainly for pornography, or who crash into other people's systems with malicious intent. But they can quickly be cut off from the Net. Online service providers in the US no longer allow material of pornographic origin to be exchanged on their systems. This

te at MIT and taught at Perdue University in the US for ten years before returning home to join the Indian Institute of Science (IISC) as professor of computer science and automation, "Almost instant access to electronic journals, home pages, post-script files of research reports by the leading researchers worldwide is a fantastic boom for researchers in India. This, at a time when our libraries are hurting from inadequate funding is a welcome fix. Of course, this shrinking of the information gap also means that we have to perform at the cutting edge, so that our home pages are of as much interest to them as theirs are to us." In other words, it's no more excuses for Indian researchers. Some have proved equal to the challenge. Today, Professor Chandru's department is planning to post an electronic journal onto the Web,



may be, however, less from a sense of outrage and more because systems just cannot handle the extra volume of traffic that plies the 42nd Streets of cyberspace.

No, certainly not all is sweetness and virtue on the infocorridors. If you plan to be travelling the Net soon, you should know about 'flame wars'. Flames are angry messages triggered by some slip-up someone makes. They can block off threats on your local system. Ask Atul Chitnis. When suspected plague broke out in India, he was the inadvertent cause...and victim...of a flame war that lasted days, when he sought to set right NRI misconceptions about the disease in India. •

### Atul Chitnis (left) working on his laptop: victim of a 'flame war'

a first from India.

Students in India have been possibly the most enthusiastic recipients of the gift of online access. At IISC, for example, many graduates are eager to pursue their studies overseas. They find it very easy to access universities across the US and in much of the English-speaking world. They can communicate directly...and at no cost...with university representatives and narrow down their search to the optimal choice. Even better, they can make friends on campus, long before they arrive there.

The government bureaucracy has also received the largesse of network connectivity. Through Nicnet, it has notched up

years of sharing information. But the bureaucracy in India is still to come to terms with what is happening to the information industry worldwide. Inspite of the experience with Nicnet, which has allowed government departments to interact with each other across the country, attitudes have not changed enough. Enlightened bureaucrats of the IAS privately admit that the government has always seen itself as the custodian of information, supposedly in the public interest. "Information in government is still governed by many restrictions, says one IAS officer, "and I don't see that easing up." All over the world governments are opening up. But in India, as activist John D'Souza puts it, "Our government is going the other way. The time has come to give ordinary citizens the right to information."

yberspace is already beginning to impact on other areas of Indian business. The publishing industry here, like the publishing industry worldwide, will soon have to come to terms with the certainty that printed matter will compete directly with screen-based information. Media groups like Business India and Dart India Ltd have already multiplied their delivery channels with valueadded services that give subscribers Email access and news and views on various topics. It is only a matter of time before the big players in the publishing business in India begin to change the way they do business with words, and exploit opportunities in cyberspace.

Real estate is also beginning to feel the tremors from this other dimension of space. Prices at Bombay's Nariman Point are supposed to be finally plateauing out because many businesses, especially the financial services and information technology sectors, are no longer dependent on physical hubs. Connectivity means you can sit anywhere and do the same business as you did from Nariman Point, and go home for lunch. Whether real estate contractors in India will be able to make a switch similar to publishing houses, and sell in cyberspace, remains to be seen.

More companies are now talking about setting up home pages on the World Wide Web (the Web or W3 is an international information retrieval system). Home pages are really like bill-boards along the info-highway that are put up to attract specific travellers. They are advertisements for products or services that a viewer can usually point and

click at more detailed information. Home pages can be, like advertisements anywhere, highly boring or extremely attractive. If you have an audio system linked to your super VGA computer, and a high-speed data link, you can witness miraculous multi-media effects on some of the home pages. The Software Technology Parks of India (STPs) have a home page.

Dr N. Vittal, secretary, DoE, and a celebrated champion of information technology in India, welcomes viewers "to India, a place where exciting developments in software" are taking place. You can see a picture of him and hear his voice. He could be in the next room. Home pages are still uncommon from

India, though online service companies have just started courting the business community. Home pages might just change the face of marketing in and from India.

Ironically, while the rest of India is still fighting for a basic right to information, cyber-Indians are usually complaining about the infoglut (an excess of infor-

mation) in cyberspace.

# Doing business in cyberspace

Despite the governrestrictions, ment's cyberspace in India is thriving. So far, overpopulation is still not a problem in India, at least in cyberspace. Various estimates put users of online services, including mere Email or bulletin boards or news services somewhere between 10,000 and 50,000. But interest in cyberspace is multiplying as fast as the AIDS virus in the country. And it is impacting on everything from the publishing industry to real estate prices.

Atul Chitnis (see box) can already hear the cash registers ring. One of the

very few people engaged in spreading awareness of cyberspace in India, his proposed multi-metro seminars in July are expected to attract over 2,000 enthusiasts. "It's like a massive adventure game, the more you find out, the less you know," he says. Aptech India Ltd has also sniffed out a similar opportunity for extending its markets in computer training. Ads for their new Info Highway Programme try, not so subtly, to work on people's fear that they may be left out if they don't become Net-aware.



Cyberspace will continue to hog media attention for a long time to come. Both *Time* and *Newsweek* have devoted special issues to it.

Other magazines have not lagged behind

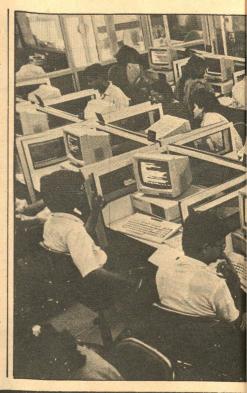
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Because any of the tens of millions of users of the Internet can put up their own road show on the information highway, finding any specific information is very much like finding the proverbial needle. There's so much wrong information, misguided information and so much trivia that one is sometimes unable to get any information at all. It is just like television, in a way. With a bewildering array of channels to choose from, the viewer finds himself surfing channels aimlessly. And just as urban Indians began to switch off Santa Barbara once they felt the addiction creeping in, people are consciously forcing themselves off the Net because, as one consultant put it, "Frankly, I'd rather be addicted to alcohol than to the Internet. It is simply a waste of time.'

The infoglut, of course, merely represents another business opportunity. Indexing services are already becoming cool on the Net. Companies are now springing up to help you find information or solutions for a fee. Netquest, a

Bangalore-based company founded by Pradeep Singh, 37, an NRI from Seattle, is a good example of an extension of that service. Netquest offers mentoring services to software developers/users. If someone, say, has a problem with his software and wants to know a way to get around that problem without wasting too much of his own time, he can delegate the job to Netquest. Netquest is currently accessible only through Compuserve, and is only troubleshooting for one software company. But Pradeep Singh has seen into the future. He can see that it has the potential to become a multimillion dollar business.

Netquest could not have existed without cyberspace highways. With very high speed communication links between Bangalore and Seattle, Netquest's geographical location becomes irrelevant. He could just as easily be in Bhutan or Brussels. Yes, other overheads are cheaper here, and there is no dearth of brilliant young engineers coming out of Indian technology institutes. Even the weather is better. But nobody who comes across Netquests's name on a bulletin



#### THE INHABITANTS OF CYBERLAND Some profiles of cybercitizens

Atul Chitnis, Bangalore, and
Ashish Gulati, Delhi: They are a
study in contrast among
cybercitizens. Both are 'online' or in
front of their computer screens for
most of their waking hours. But
both represent different sides of the
electronic realm called cyberspace.
Ashish Gulati might typify the
bohemian, anarchic spirit of
Internet with his long wavy hair, his
faded jeans and T-shirt, his
conviction that information must
flow unbridled and his 'nerdish'
passion for working the Net.

Atul Chitnis exemplifies the serious cyberspace professional, politically liberal-democratic, for whom access to information is a lifeline. He looks and dresses conventional, and optimises his time online to further his career goals. Atul and Ashish are, however, good friends. Of course, they had their first face-to-face encounter only two years after their online interaction began, Atul from

Bangalore and Ashish from Delhi. They spend much of their online time arguing. Ashish calls Atul an "old man" and Atul returns that with "young brat".

They fight about everything, but share an electronic bond that is stronger than their disagreements. When they met recently in Bangalore

Anand Padi: trading on the screen



(only their third personal meeting), the bond possibly grew stronger. Some business also took place, as, both are developing bulletin board software (BBS) packages. Atul's Cybernet will sell for a price, while Ashish's Netropolis will be freeware. Whatever else they may disagree about, for them one thing is clear: cyberspace will only help increase human interaction. Any contrary opinion, they say in unison, is "simply ridiculous!"

Anand Padi, financial consultant, Bangalore: He was the first subscriber to Dart's India Online Computer service in Bangalore. And he's never regretted it. India Online gives him real time access to the Bombay Stock Exchange, from his home or office in Bangalore.

For Rs 10,000 per year, Padi, 42, who runs an independent consultancy named Anand Padi Financial Services Private Limited, can send and receive international



The infoglut merely represents another business opportunity. Indexing services are already becoming cool on the Net. Companies are now springing up to help you find information or solutions for a fee

board knows that or where Netquest is. Netquest has a Compuserve address, an impersonal identification, which is enough.

Of course, physical location still matters, but more from the point of view of quality of life. And Bangalore, not surprisingly is where most of the connectivity wannabes reside. As India's Silicon Valley, it is the nodal centre for all information technology. Already, the STP offers various online services at Bangalore's Electronics City. Besides that, many software companies in Bangalore have their own dedicated 64 (or higher) kbps links to computers in the US. Since those computers have access to the Internet, users in India can easily log into it.

But having connectivity and using it productively are two separate things. Because cruising the Internet can be a colossal waste of precious employee time, many companies are simply restricting widespread access to the Internet within their organisations. Employees are not encouraged to surf the Net on office time, and personal E-mail is not

E-mail, receive up-to-date information on financial transactions at Dalal Street, access an impressive database of company statistics, and also read the news.

For Padi, a lover of home-cooked food and old Hindi songs, it is heaven. "I can feel the pulse of the market sitting at my home or my office and at the same time, make instant financial transactions," he says. He believes that no other industry in India, outside the information technology business, has benefited as much from the revolution in online communication as the financial services sector.

Screen-based trading has impacted on every stock brokers' lifestyle. Padi himself can clearly see the future.

John D'Souza, information activist, Bombay: Like most NGO activists, John D'Souza, 43, is a crusader for the right to information. As a core member of Bombay's venerable Centre for Education and Documentation (CED), otherwise known on the alternative circuit as just Doc Centre, John has for at least two decades been a professional information provider. He takes his rightful place now in cyberspace.

Connected to Indialink, a

John D'Souza: a professional information provider



network of Indian NGOs, and uplinked to Association of Progressive Communicators (APC), a worldwide NGO online forum, John can now cruise the bylanes of the World Wide Web, downloading information that was inaccessible from India just a few years ago. "If Bhopal were to happen now, we would have instant information on methyl isocyanate (MIC), the deadly gas which leaked from the Union Carbide factory in 1984," he says ruefully.

Now, John is in a position not just to retrieve information, but also send information on developmental activities in India, in a newly-empowered south to north dialogue. All that remains is for the Indian government to understand and accept the free spirit of the international information highway and allow ordinary citizens.

information highway and allow ordinary citizens the right to information, right here at home.

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allowed. Says C.N. Kumar, HRD director, Texas Instruments, "Unrestricted access to cyberspace, besides hogging valuable bandwidth, will lead employees to becoming defocussed from their primary job." Most companies in the information technology industry follow similar policies.

In fact, many people and companies have already had enough of the Internet. They are building firewalls around their private cyberrealms to prevent outsiders from gatecrashing. Complete freedom can be too much of a good thing.

#### Inside a computer firm in Bangalore: the centre of hectic activity

Restricting access to some people while allowing smooth access to others may become the biggest bugbear in cyberland. The Internet really is like a highway; it has space for only so many cars. If too many cars are on the road at any given time, it creates traffic jams, reduces everyone's speed and becomes self-defeating as a means of communication. Yes, you can build flyovers and priority lanes, you can have alternative

routes to the same destinations, but even that has limitations. That problem is still in the future for us here in India. Bandwidths available with the VSNL are still underutilised. It's like having an eightlane highway for a few bullock carts and the occasional tempo. There's still ample space for the heavy vehicles (the high volume users in the information technology industry).

But bullock carts, too, have found themselves a symbolic lane in cyberspace, thanks to the non-governmental organisations (NGOs). This is still surprising. Traditionally, NGOs have been suspicious of alien technologies. Often for many good reasons. Modern technology has often been capital intensive, dependent on unavailable infrastructure (like electricity). There were fears that this technology would reduce itself to another imperialist tool, worries about adverse cultural impact. Somehow, somewhere, there has been a turnaround. A computer in an NGO office is no longer an aberration. Says Pradip Thomas of the World Association for Christian Communication, in a periodical called Voices, "For technology, modern and traditional, is inherently subvertible". He writes of using information technology for 'lobbying and conscientisation'

That is exactly what is happening. Quickly realising the potential of cheap and wide dissemination of information from their point of view, many NGOs

## India in cyberspace

You could get all you wanted to know about the country sitting at home

If there had been no Tam Bram (Tamil Brahmins to the uninitiated) students in universities across America, would India ever have joined the cyberspace club? Maybe, it would have, eventually. But ever since the first Sriram Subramanyam or Mani Iyer got connected to the first modem that winged him home through cyberspace, in about the time it takes to think of a dosa, cyberspace has never been quite the same.

Ennaris (a tribe mainly resident in North America, sub-genus of the Indian race, sometimes mysteriously

called NRI) are the superchefs of the most delicious offerings on India in cyberspace. And even if you can't find some nugget of information on India, don't worry. There are 24-hour happy hackers just waiting to satisfy your appetite for information, however arcane. Whether you need recipes for gongura pickle, a list of Indian single men in universities in Texas or a description of the finer intricacies of raag Shankarabharanam, you can look for it, or ask for it, on the Net. One modest search for topics under the query 'India' leads to 621 documents, including Global Hindu

Electronic Network: the Hindu Universe. And that's just in one small suburb of cyberspace.

There is good reason why Indians have some presence on the Net.

Armed with a great degree of comfort in English, a great propensity for rhetoric and an almost natural skill for information technology, Indians have shimmered into cyberspace like a genie let out of a bottle.

There are gleeful entrepreneurs just waiting in the wings, market research dossiers in hand, for India to open up its communication lines enough to give them a seat on the are now comfortably freewheeling on the infobahn, right here in India. True, many of them are foreign-funded agencies. Computers, though getting cheaper by the day, are not exactly within the means of most NGOs. But, in the spirit of the Internet, there are many international efforts to give free or subsidised links between NGO communities.

There is a lot of sharing of information, ideas and ideologies in both directions. If Bittu Sehgal (environmentalist, writer) can download information on environmental degradation from monoculture, Minar Pimple of Yuva (a Bombay NGO) can also upload online information about Medha Patkar's satyagraha to all the world. NGOs today have a tremendous support system in cyberspace.

The only problem now is the government's regressive attitude to information-sharing. While NGOs here can now openly walk the infocorridors of the World Bank, they find it impossible to get land records in, say, Behrampur. Perhaps, though, it is only a matter of time.

Who's listening out there, however? Do NGOs preach only to the converted? "From places like India it goes largely to the liberal/open-minded individual and so in the beginning, the impact is limited to that extent," admits John D'Souza, "and the comparative advantage will increase only when really large numbers of people have online access."

transatlantic cyberrocket.

Primarily, the market is for reliable E-mail services. Mothers anxious to know if the powdered chutney they sent with Priya's uncle was good. Fathers asking their sons why no one was at home when they dialled up at midnight local time. Students confirming Air India bookings in time for their brothers' weddings back home...everyone of them can be lured into the Net.

When the Bombay riots broke out, there was a tremendous volume of E-mail from concerned non-residents, who shared a sense of shock and grief. Online access, much cheaper than telephone calls, allowed them to reach out and touch traumatised friends back home.

Online service providers like Ravi Database Computers (RDC) have

#### Cultural impact of cyberspace

Cyberspace as a cultural concept usually polarises people into two groups (in the same way that television invasion did). One group makes dire predictions about the chilling effect on interpersonal relationships. The extremists in this group issue warnings about an insular, alienated, individualistic society.

The other group is cheerfully disbelieving of such prognostications. They believe that cyberchat only makes for human interaction, unlimited by geographical barriers. Cyberspace is as good a place as any other hangout for making friends. This group feels that the only driving force behind the rapid globalisation of the Internet is in fact the genetically-driven need to make contact with other people.

Many other conjectures are made about cyberspace:

- The Internet will only increase the divide between the information rich and the knowledge poor.
- The Internet is a leapfrogging technology which will finally give a competitive chance to the south.
- The Internet is the great leveller, where no discrimination of caste, creed, colour, race and sex are operative.
- The Internet is a precursor of a Big Brother government that can peep into any citizen's life at will.
- The Internet is by nature anarchic and will reel in fascist governments worldwide. It will become a supranational presence that will make national governments redundant.



During the Bombay riots, online access allowed concerned non-residents to reach out and touch traumatised friends back home already mapped out the potential of this market.
'Indiaworld' is an online infopackage of the latest news in India.
For a mere US \$29 per year, you can dial up San Diego, the host computer of RDC, and get all the news of the day from India. In just a month, 'Indiaworld' has about 500 subscribers in the US. No need to order film magazines from home.

Stardust in cyberspace is

only an idea away. •

- It will allow the consumer/subscriber a real voice, and a freedom of choice.
- It will make the consumer more vulnerable to the pressure selling of international corporate houses.
- It will dehumanise people.
- It will rehumanise people.

Any or all of the above commonly expressed opinions on cyberspace could be perfectly prescient and valid. Whatever you say and think about the Internet, you could easily be right. Nobody knows which way the Internet is headed.

others feel that the impersonality of cyberspace is the real freedom. The common expression is: in cyberspace, no one knows that you are a dog. Or that you're Scheduled Caste or a Brahmin. Or that you have ingrown toe nails and a crooked nose. Unless you specifically tell someone so. You can also paint an inaccurate picture of yourself, though. You can claim to be tall, dark and handsome, or anything else you want to be: Salman Khan or Madhuri Dixit, you can create a cyberpersonality for yourself.

Truth will out, of course, if you are planning a face-to-face encounter with an online friend. Then it's back to the same old interpersonal dynamics.

Cyberspace will continue to hog

Somehow, however, even in cyberspace, the more things change, the more they remain the same. The same human problems, the same crimes, perversion, greed and the same exhilarations: romance, exploration, expansion of the human frontiers; except that they all move to the small screen. The Internet, uniquely, is both a microcosm and a macrocosm of the real world we know.

In India, too, potentially, the same controversies that divide the country now could easily move online. Then you will have real time electronic battles over Ram Mandir or the movie *Bombay*. Nobody seems to particularly evolve their positions with new technologies, they only upgrade the means of disseminating the same old ones.

That's why some people believe cyberspace will increase racism. But

Dr N. Vittal, secretary, DoE, and a celebrated champion of information technology in India, welcomes viewers "to India, a place where exciting developments in software" are taking place

media attention for a long time to come. Both *Time* and *Newsweek* have devoted special issues to it. Other magazines, newspapers and television programmes have not lagged behind. Everyone loves to write and talk about cyberspace. And the hype will only increase. Somehow, connectivity has become an

exciting human condition...It gets the adrenaline running and the heart pumping. And yet, at the same time, it insulates you from the dreariness of day-to-day routine. As a commentator in Forbes magazine put it, in an article titled 'Romancing the Grindstone', "The technology that lets us enslave ourselves really is sexy in a way that typewriters and filing cabinets never were." And so, people with online access find themselves working lustily, round the clock. And loving it.

ften, cruising becomes like mentally chewing gum, your jaws are working long after the flavour is gone. But there are many who not only pride in being hackers but use their addiction gainfully. Often, the best cybernauts are mere kids...though they soon become whizkids. Ashish Gulati, 23, (see box) offers networking consultancy. He's sort of a cyberspace architect-cum-contractor. He scans the darker bylanes of the Net and often finds nuggets that give him enough mileage for his next article in PC Quest magazine. And Rishab Aiyer Ghosh, 22, who lives in New Delhi, and is rumoured to be a high school dropout, has acquired an awesome reputation as a hacker on the Net.

For India, cyberspace really does offer a unique opportunity to leapfrog over technological stillwaters and join the rapids. The government simply cannot put blinkers on this technology. Nor can it wish it away. Cyberspace is Here and Now and the government will have to deal with it. "If India is not to be left behind," says S. Gopalakrishnan, deputy managing director, Infosys Technologies, "we will have to get improved accessibility. It is the key to our future."

Like him, many people are hoping that the government will create a level playing field for any entrepreneur wishing to offer value-added services on the information superhighway. Hopefully soon. The only benefit from the inordinate delay is that, by the time Indians get on the infobahn, it will have become so user-friendly, you could almost go on autopilot.

Whether the Internet becomes the Big Brother that some people fear or merely allows globalisation of the local hangout, nobody yet knows. But of course, there is always an option. People can still pull the plug out of the cybersocket. And go meet a friend. In person.

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