

Volume 14 Number 1

The **Skeptic**



SPECIAL ISSUE

Weird Science at Goldsmiths

Also in this issue:

Psychic Readings

Sleep Paralysis

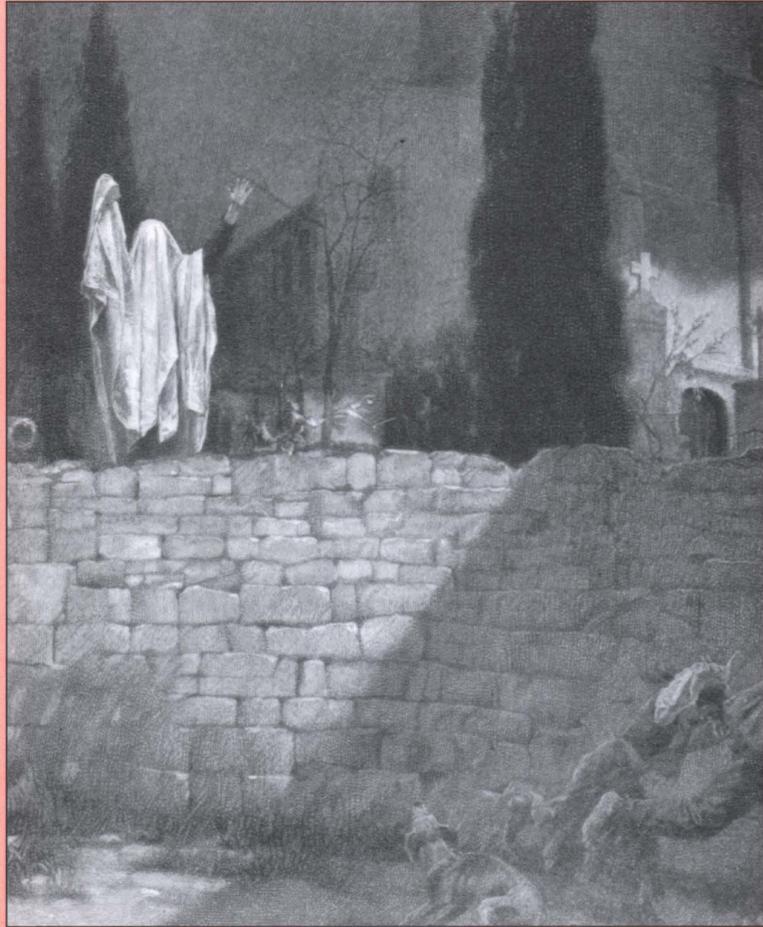
Fantasy Proneness

Magical Thinking

Mediumship

Plus: • News • Book reviews • Comment • Humour

Hilary Evans' Paranormal Picture Gallery



This picture shows a man dressed as a “traditional” ghost and standing in a graveyard, hoping to scare passers-by: it is by Andre Castaigne in *American Century* magazine, September 1898. It perfectly illustrates a notable experiment made in June 1960 by Tony Cornell of the Cambridge University Society for Psychical Research, though his motivation was less to create a public response than to study it. The cemetery of St. Peter's Church in Cambridge is on a mound, clearly within sight of the 90 cars, 40 cyclists, and 12 pedestrians who passed during the period of the haunting.

Though he was in their line of sight for about 100 metres, only four of all these passing people so much as glanced at him. A girl who alighted from a taxi thought it was an undergraduate playing tricks. No one shrieked, fainted, went into hysterics, or phoned the ghostbusters.

Cornell's conclusion: People see ghosts only when they are mentally conditioned to see them.



Hilary Evans is co-proprietor of the Mary Evans Picture Library, 59 Tranquil Vale, London SE3 OBS.

Cover photograph by Steve Yesson: Some members of the Anomalistic Psychology Research Unit, from left to right: Chris French, Louie Savva, Karen Hatton, Patrick Leman, Kate Holden, plus mystery guest. Not shown: Susan Crawley, Nick Rose, Rachel Fulcher.

the SKEPTIC : Volume 14 Number 1

ISSN 0959-5228

Published quarterly from
PO Box 475, Manchester M60 2TH
United Kingdom

Email : edit@skeptic.org.ukWeb : www.skeptic.org.ukAOL Keyword : **skeptic**

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Design and printing by

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Skeptic in Chains

Wendy M. Grossman

Oh, Death...

THIS ISSUE is something of an experiment: it is the first time in *The Skeptic's* history that we've invited in a guest editor for an issue. Chris French, who teaches psychology at Goldsmiths College, has done most of the hard work of commissioning and editing this issue. We're both grateful and curious how it will work out.

You may think, of course, that any gratitude is solely because it means less work. But that's only part of it. The existence of Chris's unit and its being populated with enough people to fill an issue is a relatively recent phenomenon. I don't remember there being any such thing fourteen years ago when *The Skeptic* started. It's enormously encouraging to see the number of academics and others who are now prepared to consider issues such as paranormal claims and parapsychology as worth studying, and to see the number of skeptics that are now visible around the UK. Sadly, as I write this, the news has just come through we have one less: John Diamond has died. In his last weeks, he was working on a book on alternative medicine. We can only send our condolences to his family and express the hope that his book will see publication.

Death and what becomes of us has been much in the news recently, what with the mass media coverage of Alder Hey. Writing in *The Independent*, religion specialist Paul Vallely analysed the situation as an example of our worship of materialism. A day later, another writer commented on the curious double standard involved in Britain's high rate of cremation (suggesting the dead body has no continued value) and the horror over Alder Hey.

I am in no way suggesting that the doctors who destroyed the public's trust in them by taking it upon themselves to harvest organs and keep them without permission did anything but wrong. Obviously organ donation is a sensitive area, and people like to feel that they are in some kind of control over what is happening to their own bodies and those of their loved ones. This is doubly true when the deceased are very young children: losing a child is the most devastating kind of loss, and it's common for parents to feel they are at fault for not having protected their offspring adequately. So the savage anger is understandable.

But.

I'd have to disagree with Vallely. Certainly, Vallely ought to be right, since if you regard the body as merely a temporary home for the really valuable part of a human, the

soul, it shouldn't matter a damn what happens to it after that soul has left. Let it disintegrate and get remade as the home for another soul in need of one. But the English tradition of ownership of the body (and also of hospitals being a grim place you go to die) predates our era of declining religious feeling, and squeamishness over what happens to one's body after death is common across many cultures. It's an odd business. I find it difficult to imagine having a funeral for a liver or a spleen, as some parents did. That people felt compelled to do so reminds us how fragile closure can be.

What I think happens with those who are uncomfortable with the idea of organ donation is that they don't quite trust doctors to wait until they're dead to harvest the remains, a fear summed up very well in the 1978 film *Coma*. Personally, I'm all in favour of some of the more unusual current methods of disposing of the dead. Lee Hays, who sang with the folk group The Weavers, for example, directed that his ashes should be sprinkled on his compost heap. One of my friends, who spent his last years observing griffon vultures, would, I think, have liked his wife's idea of throwing his body off a cliff for them to enjoy. My favourite is the Chicago actor who in his will donated his skull to a local theatre, to spend its days playing Yorick in *Hamlet*.

The saddest consequence of Alder Hey is that it won't be the doctors who suffer most, even those who are expelled from the profession because of their conscienceless disregard for the feelings of their tiny patients' parents. The people who will suffer are the children with cancer who rely on Alder Hey for treatment; a piece in one of the papers detailed their cramped conditions and noted that donations for a replacement ward had collapsed.

Organ donation has also plummeted, and research that depends on the availability of tissue will be delayed – research that, again, could help other children and adults live longer. This seems to me sad and irrational. We are not doing doctors a favour by letting them have organs to transplant or tissue to use in research, especially not in this country, with its nationalised health service. Doctors are only the conduit by which we can help others.

Ultimately, though, the issue comes back to our place in the universe. Regarding our bodies as merely meat to be devoured by Nature, "red in tooth and claw," is to accept how un-special we really are in the scheme of things, a lesson that's never been popular.

Wendy M. Grossman is editor of *The Skeptic*, and a writer and folksinger.

Hits and Misses



To research or not to research

THE HOUSE OF LORDS Select Committee on Science and Technology released its report on Complementary and Alternative Medicine (which it's dubbed CAM) in November, and its recommendations are largely sensible. Noting that some 20 percent of the British population used some form of CAM in 1999, the committee generally laid emphasis on scientific proof. Diagnostic procedures should be reliable and "scientifically validated." A therapy that claims to treat specific conditions should be supported by evidence that it can do this "above and beyond the placebo effect" especially, the report notes, if its promoters aim to have it available on the NHS as an adjunct to conventional medicine (special mention is made at this point of "group 1" therapies, meaning professionally organised therapies such as acupuncture, chiropractic, herbal medicine, homeopathy, and osteopathy). The same demand for evidence applies to long-established "group 3" therapies such as aromatherapy, dowsing, iridology, and Chinese herbal medicine; for "group 2" therapies such as Alexander Technique, Shiatsu, and healing a lesser level of evidence is demanded as long as the claims they are making are limited to stress management and relaxation. In the case of herbal remedies, which do have a scientific basis for claiming efficacy, the report recommends continuing efforts to set up a regulatory framework in the interests of public safety.

The report also recommends that each therapy should organise itself under a single professional body, which should be promoted so the public is aware of it and should abide by core professional principles. Here is where some skeptics have a problem: what does it mean to have a professional body to manage something that has no therapeutic value? Doesn't it give the therapy a veneer of respectability and authority it would not otherwise possess? This is even more true of recommendations that therapies adopt requirements for continuing professional development and accreditation. It's certainly good that the committee wants this to include training in anatomy, physiology, basic biochemistry, and pharmacology for therapies that claim to offer diagnostic information, and that every CAM practitioner should understand the principles of evidence-based medicine and healthcare and that they should encourage patients to seek conventional medical advice if they haven't already done so. But on the other hand, what professional development are crystal healers going to go in for? Geology classes?

One final note: the Chinese Medical Institute folks are deeply unhappy about the inclusion of Chinese medicine and acupuncture on the list of therapies without substantial evidence bases. "Many reputable research reports have been published in leading medical journals both in Europe and USA," the press release notes. "The beneficial evidence of Chinese medicine is clear. Nearly half of mankind is treated by Chinese medicine every

year." Perhaps so, but the committee's concern about ensuring that treatments are tested for safety was bolstered in mid 2000 by the news that a Chinese herbal remedy known as Aristolochia, used to treat fluid retention and rheumatic symptoms, had been linked in Belgium to kidney cancer.

Copies of the report are published by The Stationery Office at £15.50; the written and oral evidence is published separately in two additional volumes. The report is also available on the Web at :

<http://www.publications.parliament.uk/pa/ld/ldshtech.htm>.

The truth is in Bonnybridge

WE WERE unsurprised to see the news that Scottish councillor William Buchanan has launched efforts to twin his town, Bonnybridge, with Roswell, New Mexico, as we have a clipping from Scotland's *Sunday Herald* announcing his intention to do so last



October. What's new is that Roswell has agreed it's a good idea. Apparently, Buchanan figures that a town where there "was" a UFO crash in 1947 is an appropriate twin for a town he says has a sighting every week. Buchanan himself claims to have seen a UFO that looked like a large blue cylinder between Bonnybridge and Cumbernauld in 1994, an area he's taken to describing as a "golden triangle". We think the possibilities of such a link-up are fascinating and endless: the joint festivals alone should be entertaining and intriguing, especially since Nessie, too, isn't all that far away. We look forward in particular to the film *Alien Autopsy 2*, in which the rubber dummies representing aliens will be all-over plaid instead of the more usual green or grey, as well as many new works of scholarship on Scottish traditional music showing that all those wonderful ballads are in fact of alien origin.

Psychic predictions for 2000

RHODE ISLAND skeptic Gene Emery does an annual round-up of failed predictions from the psychics. His list for 2000 showed the usual pattern: attention-grabbing predictions followed by a deep silence when they failed to come true.

A good bit of his best material came from a “blue-ribbon panel of the world’s most gifted psychics” published by *The Sun* on January 11, 2000. It’s hard to imagine that a more wrong panel could have been assembled, even if *The Sun* had recruited only skeptics to participate.

Gloria Goldberg, *The Sun*’s own astrologer (“who predicted the untimely death of Princess Diana”), foresaw that Prince Charles would take off on the space shuttle (in August 2000) and announce his engagement to Camilla Parker-Bowles in a live broadcast from space. It’s hard to know how to score how wrong that one was.

Wanda Tarwinska (who is supposed to have predicted the fall of the Berlin Wall) expected President Clinton to announce in February that the Mars Polar Lander had been destroyed by aliens, simultaneously revealing that alien guests had slept in the White House’s Lincoln bedroom. Based on what we now know about Clinton, we can confidently say that if aliens did sleep in the Lincoln bedroom, they paid generously for the privilege. Oh, yes, and in case you were wondering what happened to San Francisco and Los Angeles, they were destroyed by a mega-earthquake last May. No? Well, you do surprise us. Maybe you just don’t read the news closely enough. Tens of thousands of people died in that one.

Mystic Meg – who never seems to run out of things to predict – told *The Globe* on December 28, 1999, that US trash-talk show host Jerry Springer would become a crusading Jew for Jesus, inspired by a Billy Graham sermon. Calista Flockhart, the ultra-thin waif of the TV show *Ally McBeal*, would also gain 75 pounds. As it happens, you could give old Meg a partial credit on that one. Flockhart did gain approximately 10 pounds or so: she adopted a baby. Skeptics also apparently missed the remarriage of Prince Andrew and Sarah Ferguson. You know, it’s like all those other psychic phenomena. You can only see them if you have a positive attitude.

Sanjiv Mishra (who claims to have predicted the Kennedy assassination), thought a savage flesh-eating dinosaur would be found in Africa in April, that the true identity of Satan would be discovered by church archaeologists searching the Vatican vaults and would be instantly recognisable to the American public, and that Christmas Eve 2000 would see the second coming of Christ.

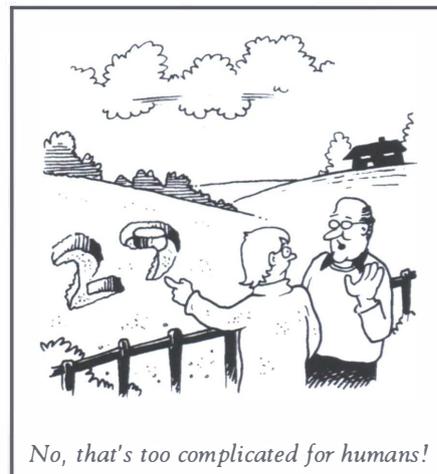
If Christ did make an appearance, no one seems to have noticed. But this may not be coincidence. Goldberg also warned that we should be concerned about the anti-Christ, who is quietly living and working in our midst as a US Congressman. Now, we know a lot of people loathe politicians, but isn’t that going a bit far?

Too complex for humans

WE WERE intrigued to hear the story of video editor Matthew Williams, 29, who was fined £100 by local magistrates after he confessed to – of all things – making crop circles (and illegally damaging people’s fields). According to the *Devizes Gazette and Herald*, Williams says there are nine crop-circle-making teams operating in the

area, and the necessary tools are a compass, a ruler, a plank of wood, bamboo stakes, and some lengths of rope. Those who remember the crop-circle-making efforts of the Wessex Skeptics will remember their methods were much the same; however, as they were equipped with both permission from the farmer whose field they used and a TV crew, they were never fined for their activities.

Williams told the paper that he began by believing that the circles couldn’t be man-made, but that the more he investigated the more he became



convinced that they were. Therefore, he and a friend made a seven-pointed star pattern in order to debunk claims by cereologist Professor Michael Glickman, who apparently said that crop circles could not be made by humans because the design was too complex. We think of the many complex inventions and patterns humans have made – computers, oriental carpets, Turner’s watercolours – and shake our heads. Professor Glickman, however, told the paper that Williams’s claim to have made a 1999 formation in Bishops Canning that featured an elaborate array of 29 internal circles merely proved Williams was a liar because 29 was important in numerology. There can surely be no greater compliment than to be disbelieved on this scale. We salute Williams.

The competing books of life

MUCH EXCITEMENT on February 12, as the human genome was published. It was both a great day and a shameful day for science, in that while sequencing the genome will doubtless, even 100 years from now, be one of the great achievements of the 21st century, the two teams of scientists involved felt they had to squabble over who did the better job. We have no opinion on this point. The salient surprise findings by now should be well known: that instead of being highly populated with over 100,000 genes, human chromosomes hold only about 30,000 to 40,000 genes, alternating vast gene-less deserts with jungle patches, and the Y chromosome makes little in the way of genetic contribution to the finished human product. Some women would say, “How like a man.” We prefer simply to note that sequencing the human genome, like almost all great science, creates more questions than it answers. The relatively small number of genes, only a few thousand more than a fruit fly, means, if nothing else, that debate over the exact roles nature and nurture play in the development of an adult human can continue a lot longer.



Weird Science at Goldsmiths

Chris French introduces this special issue of *The Skeptic*

WELCOME TO this special issue of *The Skeptic*, the aim of which is to introduce you to the work of the Anomalistic Psychology Research Unit (APRU), recently established in the Psychology Department at Goldsmiths College. The Unit consists of myself, as Head of the Unit, plus research assistants, postgraduates, other interested members of staff, and placement students. The aim of the Unit is to provide a focus for the considerable amount of research activity within the area of anomalistic psychology that is already taking place within this Department as well as to facilitate the expansion of such research.

So, what is anomalistic psychology? A large proportion of the population hold a wide range of beliefs which are incompatible with the current scientific worldview of how the universe operates. Conventional science assumes that veridical perception of the outside world must rely upon the known sensory channels – but ESP appears to operate without the use of such channels. Conventional science assumes that a cause must precede an effect – but precognition would appear to be incompatible with this assumption. Conventional science assumes that the outside world, in the form of, say, diseased tissue, random event generators, or teaspoons, cannot be directly affected by will-power alone – but various claims of psychokinesis imply the opposite. Not only do many people accept the reality of such paranormal claims, but opinion polls reliably show that a sizeable minority report direct personal experience of these very phenomena. Anomalistic psychology represents an attempt to account for such experiences without assuming *a priori* that anything paranormal is involved.

Anomalistic psychology should not necessarily be seen as being in opposition to mainstream parapsychology. In many respects, it complements parapsychology. The scientific debate over whether or not psi exists is still raging. Parapsychologists such as Dean Radin (1997) argue that the scientific evidence for the reality of paranormal forces is overwhelming and that it is only ignorance and prejudice on the part of the wider scientific community that prevents widespread acceptance of this fact. At the other extreme, critics such as David Marks (2000) maintain that the evidence is totally unconvincing and emphasise such factors as shoddy methodology, failure to replicate, and even fraud.

Personally, I feel that some of the apparent positive findings of experimental parapsychology do merit serious consideration from the wider scientific community, but it would certainly be premature to conclude that the reality of paranormal forces has been established beyond all reasonable doubt. Serious researchers on both sides of the psi debate, however, would agree that most instances of what people take to be manifestations of the paranormal are best explained in non-paranormal terms. Known

psychological (and sometimes physical) factors often interact to produce the illusion of psi. Whether or not all evidence that appears to support the psi hypothesis can be explained in such terms remains to be seen. If at some point in the future it is proven beyond all reasonable doubt that paranormal forces really do exist, anomalistic psychologists would still have provided a useful service by helping parapsychologists to sort the wheat from the chaff. On the other hand, every time anomalistic psychologists are successful in accounting for an ostensibly paranormal phenomenon in non-paranormal terms, the need for the psi hypothesis is reduced.

The topics covered in the articles that follow by no means exhaust the areas of interest to members of the Unit. Anomalistic psychology attempts to provide non-paranormal accounts not only of experiences ostensibly reflecting the operation of extrasensory perception and psychokinesis, but also those relating to various forms of evidence for life after death. Beyond this, many of the topics of interest to the anomalistic psychologist would not be accepted as part of parapsychology at all by most parapsychologists. These include such topics as alien abduction, alternative medicine, astrology, the Bermuda Triangle, crystal power, dowsing, exorcism, fire-walking, past-life regression, satanic ritual abuse, subliminal advertising, and so on – to name but a few!

Many serious parapsychologists object to this approach, which appears to them to reflect a “tabloid” definition of the paranormal as “anything weird and wonderful.” It also raises fears that, although they themselves may be careful to limit their own efforts to experimental investigations into ESP and PK, an attempt is being made to link them by association to the wilder fringes of the occult and New Age nonsense. Such worries are understandable in light of the approach taken by some vociferous critics. Ironically, some academic colleagues within psychology also have their doubts regarding anomalistic psychology. They appear to be completely baffled that anyone should want to “waste their time” trying to understand the psychology of what they see as obviously delusional beliefs. Most psychologists could reasonably be described as uninformed skeptics – a minority could reasonably be described as prejudiced bigots – where the paranormal is concerned.

I believe that both of these positions miss the essential point of anomalistic psychology. It is important that anomalistic psychologists attempt to stay abreast of the latest developments in experimental parapsychology in general terms because anomalistic psychology should not prejudge the issue of whether or not psi exists. It may be that some reports of ostensibly paranormal events (OPEs) really do involve psi. But, as stated, the main aim of anomalistic psychology is to try to provide empirically supported non-paranormal explanations for such events. It is

only by showing that such accounts could not fully explain OPEs (if indeed they cannot) that most scientists would feel any need at all to postulate the existence of psi. Some parapsychologists (for example, Bob Morris and his team in Edinburgh) already accept this and devote a considerable amount of time to studying “what looks like it’s psychic but isn’t”.

My main point here is that it is completely inappropriate to criticise anomalistic psychologists for not focussing much effort on debating the quality of the strongest scientific evidence for the psi hypothesis (e.g., the ganzfeld studies). Although a minority of the population may attempt to base their beliefs relating to the paranormal on a cool and rational appraisal of the scientific evidence, most people do not. It is far more likely that such beliefs are based upon bits and pieces of information from the media and/or personal experiences. It is therefore perfectly legitimate for anomalistic psychologists to study the psychological processes underlying belief in allegedly paranormal phenomena that few self-respecting parapsychologists would take seriously for a second. The anomalistic psychologist is primarily interested in why people believe in the paranormal, often on the basis of very flimsy evidence indeed, and has only a secondary interest in whether psi may, on rare occasions, actually operate.

The fact that anomalistic psychologists tend to cast a wide net in studying the psychology of the weird and wonderful is also justified. It is often the case that proponents of one particular paranormal claim feel that the evidence relating to their chosen passion is far superior to that put forward by the “cranks” arguing for a different claim. Many parapsychologists, for example, would view ufology with disdain and contempt. But, by taking a wider view, the anomalistic psychologist can often see parallels between the psychological processes underlying belief in and experience of a range of different phenomena. One obvious example would be the use of hypnosis and other allegedly memory-enhancing techniques in convincing individuals that they have either been abducted by aliens or abused by Satanic cults or suffered trauma in past lives. Often the very same core experiences can be interpreted in different ways (such as sleep paralysis; see the article by Nick Rose in this issue). Fantasy proneness has been implicated as a factor with respect to alien abduction claims and a host of other OPEs (see Susan Crawley’s article). There is little doubt that very similar psychological processes are involved in assessing a reading by a psychic as in assessing a reading by an astrologer (see Kate Holden’s article, this issue) – although many parapsychologists would consider astrology to be outside the borders of their subject.

The concerns that some academic psychologists have towards anomalistic psychology are perhaps more difficult to understand and probably do reflect a certain degree of prejudice and ignorance with respect to the paranormal as a whole. Some appear to think that the main point of research in this area is to try to prove that psi does not exist. Many psychologists feel that, without having to actually look at the evidence, they already know that psi is not possible and

therefore such research is pointless. Leaving aside the somewhat unscientific attitude that such a position reflects, what I have written already should be enough to show that this is not the primary aim of anomalistic psychology anyway. Others appear to feel that the study of such beliefs is in some sense trivial, and not “proper psychology”. My own view is that “being worthy of serious scientific investigation” and “being featured on *Kilroy*” are not mutually exclusive categories for potential topics of interest. The truth is, as stated earlier, the majority of the population do endorse paranormal beliefs of various kinds and a sizeable minority claim to have direct experience of the phenomena in question. The behaviour of many people is affected in a very direct way by their paranormal beliefs. How could psychologists possibly justify ignoring such beliefs and practices which are found in one form or another in all cultures at all points in history? Furthermore, study of the subject matter of anomalistic psychology can cast much light on topics of central importance to mainstream psychology. These include (again, to name but a few) delusions, hallucinations, dissociation, false memories, hypnosis, cognitive biases, reality monitoring, suggestibility, and so on.

To be fair, it is probably only a minority of psychologists who display such prejudice – and it is usually those who are even older than me! But in response to such attitudes, the APRU is making a concerted effort to raise the academic profile of anomalistic psychology by various means. These include organising symposia on anomalistic psychology at international psychology conferences (such as the British Psychological Society’s Centenary Conference and the European Congress, both held this year).

In addition to the articles referred to above, there is an article by Liz and Louie Savva examining the alleged psychic abilities of Florence Cook. Their article underlines the need for properly controlled conditions in investigating paranormal claims. Finally, Karen Hatton considers the developmental roots of paranormal beliefs. Although it is often claimed that children are prone to “magical thinking”, very little research to date has directly addressed the issue of how paranormal beliefs may develop from childhood to adulthood. Karen’s research is an attempt to do just that.

We hope that you find the articles in this issue of interest. For further details of the activities of the APRU, have a look at our web-site at www.goldsmiths.ac.uk/apru (but note that Kate Holden is responsible for the garish colours). For those of you with a serious interest in anomalistic psychology, you will find there, among other things, details of an email network devoted to the subject that you might like to sign up with.

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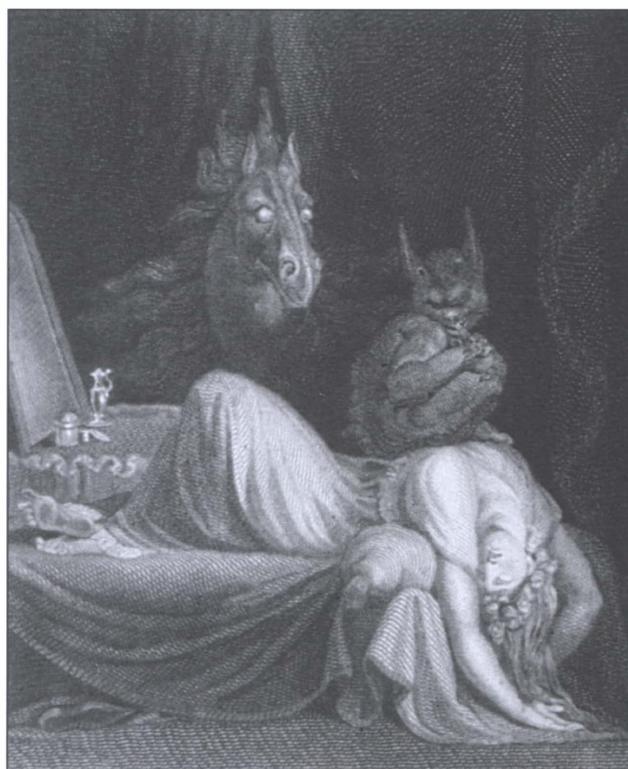
Something wicked this way comes!

But Relax, says Nick Rose, it's just sleep paralysis

I went to bed at my normal time, though I was a little overtired. As I lay on my back in bed and began drifting off to sleep, I suddenly woke up, but was completely unable to move. I could hear or feel a strange buzzing or vibrating noise inside my head, and at the same time I felt a horrible presence in the room with me. My eyes were open and I could see my bedroom. I could see this dark shape, like a shadow, standing at the end of the bed. I tried to call out, but I felt like I couldn't breathe, and I could only manage a strangled cry. It felt like I had a heavy weight pressing down on my chest. I could feel this dark shape getting closer to me and I was terrified. I heard or felt it say something to me, but I couldn't make out the words. It felt like it started to pull me upwards off the bed by my legs. I struggled, desperate to move or cry out, but could not. In a final effort I concentrated on moving one finger, and with a struggle I managed to move it just a bit. Then suddenly it was over, I broke free of the paralysis and the presence disappeared.

EVER HAD a ghost come into your room and attack you just as you were falling asleep? While I worked as a parapsychologist in Bristol we got phone calls and letters from quite a few people who had. Quite often, simply learning that such experiences had a name, were surprisingly common, did not mean you were mad, and did not mean that ghosts or other supernatural entities had singled you out for bizarre nocturnal torture, was enough to alleviate their fears. It was an unusual experience for me, as generally my attempts to offer alternative explanations for apparently supernatural occurrences feel like "spitting against the wind". However, on most of these occasions the person reporting these experiences seemed delighted and reassured to be given an alternative explanation. So, whether you are a sufferer or not, a believer or not, here is what I think everyone should know about sleep paralysis.

Sleep paralysis (SP), unlike many medical or psychological phrases, does "exactly what it says on the tin"; it is a sleep disorder which involves a period of inability to perform voluntary movements either when falling asleep or upon awakening. Along with an inability to move, SP is often accompanied by dreamlike thought processes and hypnagogic imagery (hallucinations we all get as we go to sleep). In medicine, SP is commonly recognised as a symptom of narcolepsy, but what has been generally overlooked is that isolated forms of SP also occur in non-narcoleptics. Estimates of the incidence of SP in the ordinary population vary considerably; anywhere between 25 percent and 40 percent, though the broad consensus is "about a third". This variation in reported incidence is probably because such experiences are often tied to different cultural interpretations and a local name for the experience, and are not always correctly identified.



These hallucinations and the paralysis itself can be frightening or threatening. SP often feels like or is interpreted as an attack by a supernatural entity. Perhaps the most commonly cited example is from Hufford's book *"The Terror that comes in the Night"* in which he examines experiences reported in Newfoundland called "Old Hag" (which refers both to the terrifying experience and to the entity that attacks the victim). He comes to the conclusion that "Old Hag" can be best understood as sleep paralysis with a particular kind of hypnagogic hallucination. Sleep paralysis is an experience reported all over the world. In Japan the experience is called "Kanashibari". The Chinese call it "Ghost Oppression". One pair of researchers have identified many different cultural variations; "The witch riding you" in the USA, "Kokma" attacks by the spirits of dead unbaptised babies in St Lucia, "Phi um" the feeling of being enveloped by a ghost in Thailand, "Hexendruckem" or passing witches in Germany, "Ha-wi-nulita" being squeezed by scissors in Korea, "Pesadilla" a nightmare in Mexico, and "Stand-stills" in the UK. SP has also been linked with the experience of "alien abduction". Canadian researchers have studied people who reported close contact with UFOs, and divided the experiences into intense and non-intense. The intense experiences were more often sleep related, more often unpleasant, and a quarter described symptoms that could be interpreted as sleep paralysis.

What is the experience of SP actually like? The most commonly associated symptoms of SP are anxiety or intense

fear, the sensation of a weight on your chest and the feeling that someone or something is in the room with you, a presence. A diverse range of visual, auditory and tactile hallucinations is also quite common. Some years ago, Dr Susan Blackmore and I carried out a large case study of experiences in which reality and imagination were confused. Of the 338 cases received 162 of them contained descriptions of SP. A variety of experiential features were found to be associated with the sensation of paralysis, including: malign or hostile presences, a vibrating or humming noise in the head, and the feeling of being touched or pulled about. From the reports we received, and the analysis carried out, we assembled a "typical" SP report. It's the quotation at the beginning of this article and should hopefully give you an idea as to how unpleasant these experiences can be.

Why does SP happen? Research, mostly carried out in Japan, has linked sleep paralysis with "sleep onset REM periods". REM stands for "Rapid Eye Movement" and is the period of brain activity typically associated with dreaming. When the body and the brain enter REM sleep, most of the muscles of the body completely relax and the brain blocks those nerve signals that would ordinarily allow you to move your limbs (to stop you acting out your dreams). One suggestion is that all types of sleep paralysis are due to the inappropriate timing of this normal (indeed vital) REM sleep paralysis. Japanese researchers have even been able to elicit isolated sleep paralysis in normal participants by interrupting their sleep during the night. One of the participants reported auditory and visual hallucinations and unpleasant emotions during the sleep paralysis.

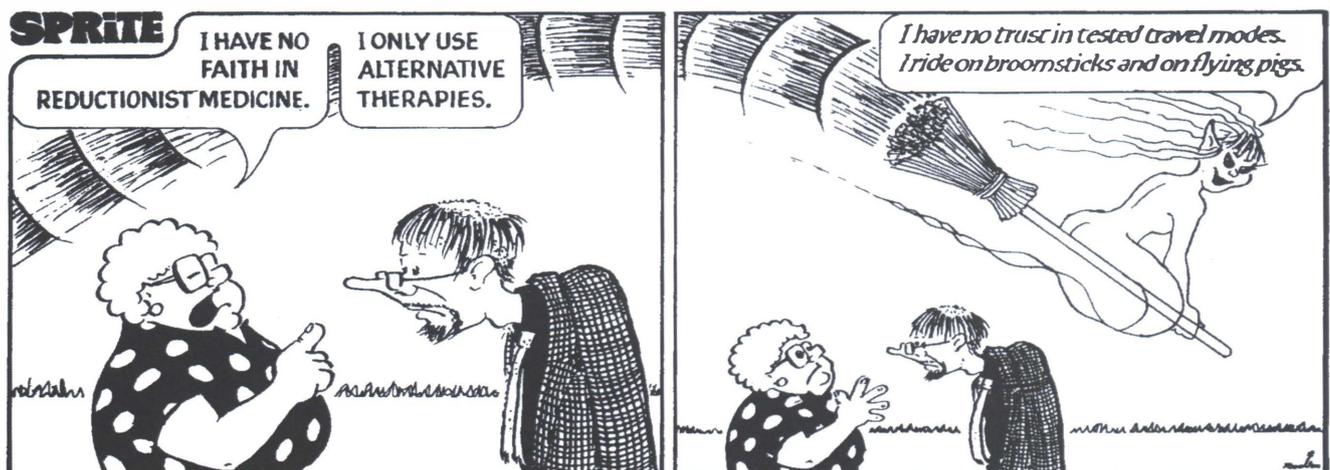
What brings on an attack of SP? Nobody really knows why some people get this experience all the time whereas others will never have it; it may simply be individual genetic differences. However, it has been found that sleep deprivation (or a disruption in your normal sleep pattern), stress and anxiety before sleep, and lying on your back are all associated with bringing on an attack of SP. Indeed, one name I've come across for SP is "Night Nurse Paralysis"; not after the brand of flu medicine, but because of the apparently common reports of SP among nurses doing night shifts.



If you get SP what can you do about it? I get asked this a lot, and I'm afraid I don't know of a cure. If you get the attacks all the time, or are particularly worried about it, it might be worth seeing your GP. However, most people I've met with the condition simply learn to relax and try and go back to sleep. When they feel the attack coming on they say to themselves, "Oh, it's just sleep paralysis, go back to sleep". Other people try to break out of the paralysis by trying to move part of their body; like a finger or toe, and claim some success. One person I met claimed she could break the effect by holding her breath, rather than fighting to breathe. Some people even learn to enjoy their SP experiences, using them as a starting point for an Out-of-Body experience. Even if none of these strategies are effective, knowing that SP is harmless usually helps; it's not ghosts or aliens and you're not dying!

Sleep paralysis cannot be expected to explain every ostensible paranormal experience that people report. But, it is a common experience that the majority of the population will have never heard of, and it is often misinterpreted as a paranormal experience. Whatever your interest in people's paranormal experiences, it is worth knowing something about sleep paralysis. I used to do occasional appearances as the token skeptic, "spitting against the wind" on daytime talk shows, or the live, "after the pub" debate shows about various paranormal topics. It was not uncommon for an experience of sleep paralysis to come up and at the very least it made a refreshing change from meeting "the reincarnation of Mary, Queen of Scots" (again).

Nick Rose is currently engaged in research into sleep paralysis.



Psychic or Fantasy-Prone?

Susan E. Crawley discusses the “fantasy prone personality”.

IN THE EARLY 1980s researchers Sheryl Wilson and Theodore Barber (1983) were attempting to discover what makes some people good hypnotic subjects when they made the chance discovery of a “fantasy-prone personality”. In addition to an ability to produce a fine hypnotic performance, these individuals were found to have a cluster of characteristics (including both vivid imagery abilities and vivid personal memories) not shared to anything like the same degree by their less hypnotic counterparts. The key characteristic which lent its name to the syndrome was their extensive fantasy lives, with 50 percent or more of their time spent lost in fantasy or daydreams. This appeared to be an important part of their lives although one they preferred to keep secret, even from their nearest and dearest. A further discovery was that these same individuals made frequent claims of psychic abilities and paranormal experiences including telepathy, precognition, out-of-body experiences, automatic writing, religious visions, encounters with ghosts and spirits, and an ability to heal by touch. Support for the existence of a fantasy-prone personality, which is estimated to occur in around 4 percent of the population, has come from large scale studies in the United States undertaken mainly by Steven Lynn and Judith Rhue (1988).

Of Wilson and Barber's initial sample, some 94 percent believed themselves to be psychic, reporting numerous telepathic or precognitive experiences, while around 50 percent claimed to have experienced automatic writing. Wilson and Barber found characteristics suggestive of fantasy-proneness in the biographical accounts of religious visionaries such as Joan of Arc and St. Bernadette, and biographies of noted psychics and mediums, such as Eileen Garrett, Mrs Leonard and Madame Blavatsky, of whom W.B. Yeats remarked “she dreams while awake”. However such evidence is retrospective and open to criticism on the grounds of selectivity and confirmatory bias. While a number of researchers, including Harvey Irwin (1990), Chris French and me, have confirmed an association between measures of fantasy-proneness, paranormal belief and experiences, tangible evidence of actual psychic abilities is more elusive.

Experimental research is both limited and not encouraging. Rhue and Lynn (1988) found that while fantasizers overestimated their success on a test of clairvoyance, in practice they did no better than non-fantasizers. Rao (1992) investigated the relationship between fantasy-proneness, self-reported frequency of psi experience, and performance on a five-run clairvoyance test. Although, as expected, fantasy-proneness scores were positively related to the reported frequency of psychic

experiences, this was not reflected in their test performance. Of course one negative result from a small scale study cannot be taken as conclusive evidence that their paranormal powers should be attributed to fantasy, but until evidence to the contrary is forthcoming it might be worth considering other possible explanations for their reported abilities.



Eileen Garrett

A good place to start is by examining the antecedents of fantasy-proneness. Wilson and Barber identified a number of routes to adult fantasy proneness which received support from the work of Lynn and Rhue. While a number of fantasizers had received parental encouragement to be imaginative, or had taken part in creative arts such as drama or ballet, it appeared that many had used fantasy as a way to reduce feelings of loneliness or isolation, and others to escape abusive or unstable environments. This finding formed the basis of a theoretical model outlined by Irwin (1993) which saw fantasy-proneness as a central, mediating factor between childhood trauma and paranormal belief and experience. In other words, Irwin suggested that childhood trauma may in some cases give rise to the use of fantasy as a form of escape or coping strategy, and this in turn may foster the creation and maintenance of paranormal beliefs which may offer a sense of control over a seemingly uncontrollable world. This would especially be the case where paranormal beliefs are encouraged by the person's social or cultural background. Some support for Irwin's model came from a study by French and Kerman (1996) who found higher levels of fantasy-proneness in a group of adolescents with a known history of childhood abuse than in a control group who were not known to have experienced abuse. More recently, Tony Lawrence and colleagues (1995) have argued that the results of their research suggest that this particular route to paranormal belief is more likely to stem from control-related trauma such as abuse, while loss-related trauma is more likely to lead directly to paranormal belief or experience. For example someone might turn to religion or spiritualism to help them to deal with bereavement.

What other possible explanations are there for such self-proclaimed paranormal abilities and experiences? A skeptic might argue that the answer lies in the fantasies themselves, which are reported to be “as real as real”. The fantasizers admit to occasional problems in deciding whether something had really happened or whether they had merely imagined it. An alternative argument is that fantasy-prone individuals do possess some special ability or abilities which make them more receptive to psychic experiences or to experiences which appear to be paranormal. An examination of the research uncovers a number of recurrent, interrelated candidates.

It has been found that high levels of fantasy-proneness and hypnotic susceptibility are in turn associated with higher levels of absorption and dissociation. Absorption refers to an effortless ability to give one's total attention to something resulting in an imperviousness to distraction. The absorbed person may also experience an altered sense of self, and a heightened sense of reality with respect to the focus of his or her attention. It has been suggested that a state of absorption may be psi conducive, but ESP studies under ganzfeld conditions have produced mixed (and even negative) results. Cooperstein (1992) observed that psychic healers typically enter a state of absorption before getting down to work. As mentioned earlier, fantasy-prone individuals often claim an ability to heal by touch; indeed a number of Wilson and Barber's original group were working as healers.

Not surprisingly perhaps, absorption is also associated with dissociative experiences. Dissociation may be accompanied by disruptions in identity and memory, also by disruptions in consciousness that may be experienced as feelings of unreality or of detachment as though watching oneself from outside. Could dissociation perhaps help to account for some of the fantasizers' ostensibly paranormal experiences?

Irwin thought that paranormal beliefs and experiences might offer fantasizers an illusion of control, especially where such beliefs were fostered by the social environment. Self-serving beliefs, together with hypnotic susceptibility, absorption and dissociation, may offer some explanation of some of the fantasizers' paranormal and psychic claims. We are currently investigating other candidates.



A hypnotised subject is sent forward in time and describes the end of the world – fact or fantasy?

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Susan E. Crawley is carrying out postgraduate research into the relationship between fantasy proneness, false memories, and paranormal belief and experiences.

SKEPTICS IN THE PUB

Skeptics in the Pub meet on the 3rd Thursday of every month at the Florence Nightingale Pub, Westminster Bridge Road.

Guest for May is David Marks, speaking on The Psychology of the Psychic.

June: Scott Campbell, Why Falsification is False.

Skeptics in the Pub meetings begin at 7.30pm. The venue is upstairs in the Florence Nightingale pub, 99 Westminster Bridge Road, London SE1 (junction with York Road, on the roundabout, near Waterloo station). Talks are followed by informal discussion in a relaxed and friendly pub atmosphere. Guest ales and food available. Non-skeptics are welcome and you can turn up at any time during the night. Further information and mailing list announcements available from pub@skeptic.org.uk or Scott Campbell at (0115) 846 6964.

Skeptical Stats

1. Cost of a pair of silver-plated, radiation-shielding boxer shorts: **\$54.**
2. Size of the chunk of chalk that sheared off the white cliffs between Dover and St. Margaret's Bay: **100,000 tons.**
3. Normal erosion of cliffs every year: **1 cm.**
4. Amount Matthew Williams was fined for "causing criminal damage" by creating a crop circle in the shape of a seven-pointed star at West Overton in August 2000: **£100.**
5. Length of time Williams estimated it took to make a crop circle: **3 to 4 hours.**
6. US acreage devoted to raising GM crops: **70 million**
7. Number of UFO sightings local councillor William Buchanan claims have taken place in the "Bonnybridge triangle": **60,000.**
8. Age of girl who died in a rebirthing ceremony in Evergreen, Colorado, while her mother watched over a video screen: **10.**
9. Cost of ceremony: **£4,500**
10. Estimated cost of doctors' errors to the NHS, per year: **£2 billion.**
11. Percentage of the British population that admits to being superstitious: **30.**
12. Percentage that believe that breaking a mirror will bring them bad luck: **37.**
13. Rank of communists on a December, 2000 Pentagon list of 238 threats to national security: **238**
14. Rank of escaped zoo animals: **202.**
15. Annual cost to the UK of obesity: **£2.5 billion**
16. Cost of a "Psychological Horoscope Analysis" from Equinox: **£28.**
17. Winning bid for a six-foot hamster with three-foot high slab of cheese from the Millennium Dome's Work Zone: **£3,000.**
18. Winning bid for a brain from the Body Zone: **£1,050**
19. Percentage of Florida voters who believed in February 2001 that the 2000 election results were accurate: **46.**
20. Percentage who thought so in November 2000: **61.**
21. Percentage of Florida voters who thought in February 2001 that George W. Bush really won the election: **56.**
22. Percentage who thought so in November 2000: **49.**
23. Percentage willing to spend \$200 million on a state-wide touch-screen system to improve accuracy: **66**
24. Estimated cost of a "Firebird" personal flying machine from Southend-on-Sea-based Intora: **\$80,000.**
25. Date when Intora hopes to begin production: **before mid-2002.**

Sources: 1 <http://www.lessemf.com>; 2,3 *Independent*; 4,5 *Dezives Gazette and Herald* 12/21/2000; 6 *Discover*; 7 *Sunday Herald*; 8,9 *Daily Telegraph*; 10 *Sunday Telegraph* (AN Wilson); 11,12 NOP survey, commissioned by Future365.com and reported in the *Edinburgh Evening News*; 13,14 Internet rumour, attributed to Pentagon; 15 National Audit Office; 16 <http://www.astrology.co.uk>; 17,18 *Independent*; 19,20,21,22,23 *Mason-Dixon Polling/Miami Herald*; 24,25 *Discover*.

 Skeptical Stats was compiled by Wendy M. Grossman, with thanks to Rachel Carthy for additional assistance.

The Psychology of Psychic Readings

Kate Holden considers the popularity of psychics and examines the technique of “cold reading”

THE FOCUS of my work at the Anomalistic Psychology Research Unit is on why a considerable proportion of the population place their trust in psychics. Psychics claim to be able to reveal information about a person or foretell their future by paranormal means alone. Many use “divination” techniques when delivering their intuitions. These range from well-known methods such as astrology, tarot and runes through to more weird and wonderful methods such as haruspicy (inspecting the entrails of slaughtered animals), cephalomancy (interpreting the movements of a donkey’s head), cromniomancy (divination by onions), and, everybody’s favourite, oenomancy (divination by wine). Many divination aids are readily available in shops to self-administer, such as “teach yourself rune stone reading” kits. Indeed, if you own a cat who is desperate to unlock the secrets of its nine lives you may be interested to know that Dennis (1996) has produced a “Tarot for Cats” pack. This encourages your moggie to pick their own cards and receive guidance on issues such as mousing, hairballs, and tolerating humans.

On a simplistic level, it could be argued that paranormal powers are accepted by people despite a lack of supporting evidence due to the simple fact that they are far more entertaining than anything that rationality has to offer. However, this does not explain how beliefs persist and go beyond a shallow interest to a point where actions are affected (e.g. actually visiting psychic readers and acting upon their advice). Not surprisingly, it has been found that for many people psychic experiences are the single most common reason for belief in psychic phenomena. In addition, people who visit psychics are typically impressed by what they hear. The question arises then of why psychic readings can impress so many people, if the evidence suggests that such powers do not exist.

Cold Reading

A powerful technique known as “cold reading” goes some way to answering the above question. This technique has enabled commentators such as Ray Hyman and Ian Rowland to successfully convince people that they know all about them without having to call upon any paranormal forces. Roe (1991) has characterised cold reading as a technique which encompasses a number of strategies which operate in a hierarchical manner. Strategies which are at the higher levels are dependent upon the use of those below for success, with different levels requiring different degrees of interaction with the client. Each of the strategies presented by Roe (1991) will now be briefly outlined.

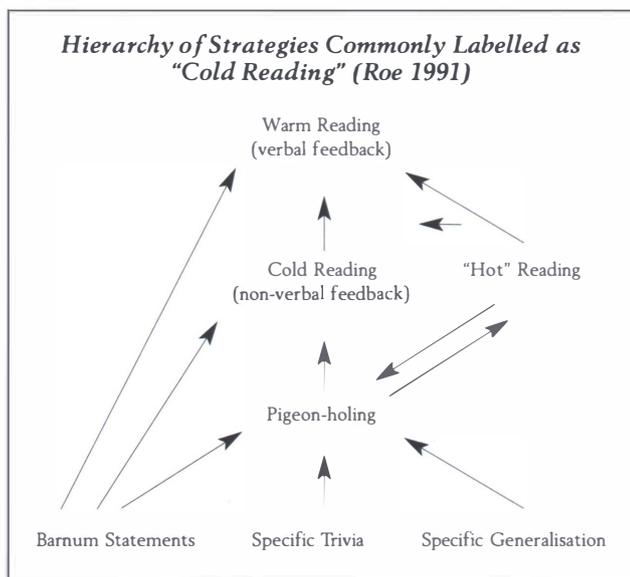
Barnum Statements

One underlying feature of all psychic divination methods can be said to be the reliance on generalised personality feedback, otherwise known as stock spiels, or the “Barnum effect”. The use of Barnum statements in a reading does not require the reader to have had any contact with the client. First researched by Forer in 1949, the Barnum effect is the tendency of people to be impressed with the accuracy of highly general statements that can fit any individual. The literature gives two reasons for naming this tendency the “Barnum effect”, both of which are based on quotations from circus owner P. T. Barnum. The first explanation is that P.T. Barnum maintained that the secret of his success was that he provided a little something for everyone. The second explanation is more cynical, and points out that Barnum is alleged to have coined the infamous phrase “There’s a sucker born every minute”. Initially, the Barnum effect was explored by researchers within the context of personality theory and assessment, the relevance of the effect to understanding paranormal effects being largely ignored. However, the fact that Forer had obtained his general statements from an astrology book, rather than a personality text, indicated that the Barnum effect might be relevant in other contexts.

Forer’s (1949) original personality sketch was presented as numbered phrases. The first lines are presented here as a continuous paragraph:

You have a great need for other people to like and admire you. You have a tendency to be critical of yourself. You have a great deal of unused capacity which you have not turned to your advantage. While you have some personality weaknesses, you are generally able to compensate for them.

Barnum profiles have been used by numerous researchers in studies which have replicated the susceptibility of individuals to the basic effect. People tend to be very impressed with such generalised



descriptions. For example, participants in a study by Ulrich, Stachnik and Stainton (1963) reacted with comments such as "Surprisingly accurate and specific in description", "Applies to me individually, as there are too many facets which fit me too well to be a generalisation", and "On the nose! Very good. I wish you had said more".

Specific Trivia

"Specific Trivia" are items which are so deliberately trivial so as to be forgotten unless they come true (e.g. "you will make a decision regarding the preparation of a meal..."). Such statements can be used to pad out a reading, or can help to structure it.

Specific Generalisations

Couttie (1988) defines "specific generalisations" as items which, although specific, are meaningful to most of the population (e.g. referring to a male relative who died of pains in the chest). "Cradle-to-grave" readings may also be used. These are based on the principle that everyone passes through the same stages in life at more or less the same ages.

Pigeon Holing

This is offal, I wish I had better reading material

The process of categorising a client and generating a stereotype on the basis of that category has been termed "pigeon-holing". This can range from reliance on information about the client's age and sex, through to more specific breakdowns achieved through observation of the client's clothing, accent, physical features etc. Strategies to determine what a client's particular issue of concern is rely on the fact that we are all more alike than we are different. For example, issues which tend to cause people concern can be said to fall under the three main categories of love, money and health.

Feedback

The futures looking rosier already

When a reader has access to feedback, the categories mentioned above can be further refined by noting the client's response (expression, movements, dilated pupils, blushing, etc.) to the introduction of the topic.

Negative responses to a topic mean that the reading can be modified, or the reader can "opt out" and refer to other general categories.

Cognitive and Motivational Differences

Cold reading, and in particular the Barnum effect, can go some way to explaining why people may be impressed with what psychic readers and astrologers tell them. This has led previous researchers such as Dutton (1988) to react to the discrepancy between public opinion and experimental evidence regarding psychic powers by focussing on possible deception on the part of the reader, and personal factors such as gullibility on the part of the client. It should be noted, however, that such an approach does not allow the whole picture to be revealed. In particular, it ignores the fact that people may differ in their motivation to seek advice from a psychic in the first place. Apart from vague references in the literature to a "will to believe" (e.g. by Gilovich, 1991), the issue of what motivates individuals to place their trust in psychics has hardly been addressed by researchers. My research at the Anomalistic Psychology Research Unit aims to redress this balance by exploring motivational and cognitive differences between believers/users of psychics and astrologers and non-believers/users. Research I have conducted to date (in collaboration with Dr Chris French) suggests that believers in psychics and astrologers may be motivated by a greater need for self-knowledge than non-believers. Further research to be conducted at the Unit will explore the role of cognitive and motivational biases in interpreting astrological readings.

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The Enigma of Florence Cook

Liz Savva & Louie Savva reflect on spiritualism and the medium Florence Cook

SPIRITUALISM was first formally established in the United States during the mid-nineteenth century, where it spread quickly across the Atlantic into Europe. The basic tenets of Spiritualism were that the human personality or "spirit" survived bodily death and could choose to communicate with the living through a specific individual or "medium". Spiritualism was a quasi-religious movement, with orthodox religious beliefs and occult practises combined in a unique mixture. It was something that the Catholic Church, among others, found threatening, but which the members of the Spiritualist movement felt to be a natural progression of their own Christian beliefs.

Podmore (1963) described the mediumistic skill of materialisation as "the crowning achievement of later Spiritualism." (p. 95). Florence Cook was the first medium to materialise a full figure in good light, and this endowed upon her a certain importance within the Spiritualist community. Cook was born in 1856, the first of four children, to parents who had moved from rural Kent to London. Her father was connected to the printing trade, and the family lived a relatively comfortable life, somewhere in the boundary between the upper working class and the lower middle class. She was fifteen years old when she first came to prominence as a spirit medium, but from the age of fourteen had suffered from what were apparently trance-like states. Initially her mediumistic qualities were developed at home and amongst her friends. However, her mother was increasingly concerned about her trance states and introduced her to the Dalston Spiritualist Association.

With the arrival of a new medium, a circle was formed comprised of friends and trusted members. The aim of such a circle was to train new mediums. An experienced medium initiated contact with the spirits and then invited the younger medium to take over. Initially Florence focused on developing her skills with her spirit guide, Katie King, who was reputedly the daughter of the famous nineteenth century buccaneer, Henry Morgan. She developed the technique of using a cabinet from the top of which the materialised face of Katie King and other spirits would appear.

While Cook was concentrating on the development of her mediumistic abilities she was obliged to leave her post as a school teacher, at Miss Eliza Cliff's school in the Richmond Road. It had been reported that while at school she was at the centre of bizarre disturbances, where books and pencils appeared to fly around the classroom. The Headmistress complained that she was "accused of Spiritualism" (Haynes, 1982, p.118).

After Cook was dismissed from the school, she went to the Isle of Wight to undertake a series of experiments with a Dr. John Purdon and his wife. At these séances Cook would sit in a cabinet with her hands and feet bound, and a spirit face would materialise. However, it was later found

that her bonds had been broken and doubt was cast upon her integrity.

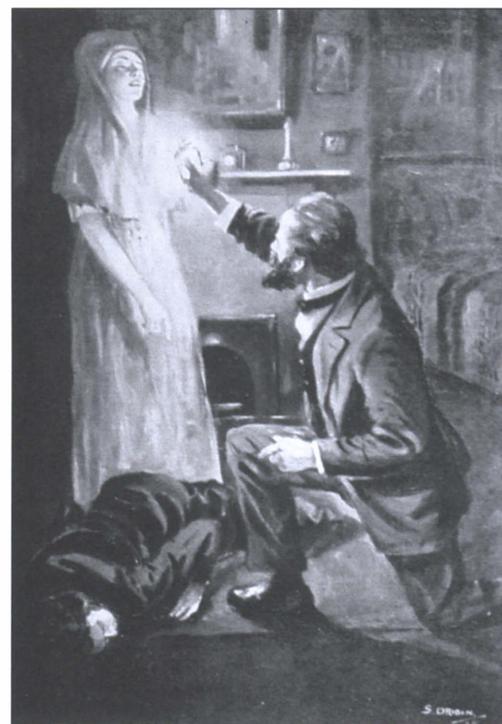
She attributed this to the presence of evil spirits, and in her favour was the fact that no cutting instruments were found upon her person. The experiments were repeated with steel chains and Cook proved able to manifest the faces again. Purdon concluded that "she is a wonderful medium and, what is better, is one who is not afraid to show the dark side any more than the light ..." (Inglis, 1977, p. 267).

Dismissal from her teaching post increased the incentive for her to make her spiritualistic skills pay off. At the same time she came up against serious competition from other young mediums such as her own younger sister. Pressure from the competition forced Cook to hold a séance in which an entire human form was materialised. While tied up in a cabinet wearing a black dress, a tall female figure with bare hands and feet, appeared and spoke a few words. She identified herself as Katie King, Cook's spirit guide. Sitters were thoroughly baffled by this, as Cook remained bound to her chair, wearing the black dress and boots.

The most eminent supporter of Florence Cook was the renowned physicist and chemist, Sir William Crookes. The famous European psychologist Flournoy (1911) wrote that during the experiments undertaken by Crookes with Cook, the apparition was:

So real, that the noted chemist walked with her arm in arm in his laboratory, photographed her several times and proved that she differed from the medium in several ways - by a larger waist, a smoother skin, the absence of a scar on her neck, the more regular beating of her heart, more healthy lungs, etc. (p. 219)

In spite of the alleged differences between Katie King and Cook, some had serious doubts that there was anything spiritual in Cook's performance. It was argued that Katie King was merely Cook dressed in a white garment. Crookes adamantly defended Cook, whom he had investigated both in his laboratory and at his home.



Florence Cook seen separately from "Katie King" by Crookes.

"Katie King" among sitters
at the Crookes' home.



Florence Cook



Cook's periods with the Crookes were not uneventful, with Crookes' wife often claiming to have seen Katie King wandering about the house. Crookes' investigations were often undertaken in good light with five different cameras working and while Cook regularly materialised Katie King, Crookes never actually saw both of their faces simultaneously. Podmore (1963) pointed out that the evidence provided by Crookes as to the honesty of Cook's manifestations is at best "wanting" (pp.153-154). The photographs of which he speaks are not convincing. Indeed, if anything they point to a remarkable similarity between Cook and Katie King. On some occasions, Crookes possibly did witness more than one figure. However, it is important to note that these particular séances were conducted in the home of the medium and in the presence of numerous family members. Moreover, instead of the cabinet, Cook was using her own bedroom. This surely leaves Crookes' observations open to criticism, as these séances quite clearly did not occur in a controlled scientific environment. It is clear that the confidence that Crookes expressed in Cook was based on his belief in the personal integrity of the medium.

In the light of his ardent defence of Cook, and an alleged later confession after her marriage, Crookes is accused of having been seduced by her. However, given Crookes' highly developed sense of scientific conscience, and his life-long devotion to his wife, who was also fond of

Cook, this allegation seems unlikely. It is, however, a genuine possibility that his relationship with the medium was not as distant and neutral as it should have been. Several contemporary observers are known to have criticised him for this. Owen (1989) pointed out that Crookes was certainly "captivated" (p. 229) by the spirit, and colleagues claimed that his support of Cook was given "with prejudice scarcely becoming an F.R.S." (p. 229).

It is certainly possible to argue that his unbending support of Cook, who was a charming and attractive woman, was perhaps motivated by more than scientific interest. Rumours were definitely circulating at the time to that effect and it was these that led to Crookes abandoning his research into Spiritualism and returning to his

other very successful work. Florence Cook died in London in 1904.

While the popularity of Spiritualism has ebbed and waned, the quality of the evidence supporting Spiritualists' claims has remained unimpressive. Even today an investigation as highly publicised as *The Scole Report* (Keen, Ellison, & Fontana, 1999), which was hailed by some as the definitive proof on the existence of an after-life, seems little more than a collection of old tricks. Summers' (1925) point that "Modern Spiritualism is merely witchcraft revived" (p. 269) seems as relevant today as ever.

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Developmental Origins of Magical Beliefs

Karen Hatton considers children's understanding of magic

HOW MANY of you as adults still make wishes? For instance, do you wish you could win the lottery on a Wednesday or Saturday evening? Woolley, Phelps, Davis, and Mandell (1999) state that wishing is a particular form of direct mental-physical causality and that belief in wishing may be a part of the domain of magical beliefs. Most adults know that direct mind-world causality is not an effective way of altering the physical world, that is, they have clear beliefs that simply thinking about something or wanting something cannot make it happen directly. Yet intriguingly some adults still engage in wishing, although they may not believe in its efficacy.

My area of research focuses on the developmental origins of magical beliefs, which includes the concept of wishing. Of related interest is the degree to which children engage in magical thinking. Although much research on children's theories of mind indicates that young children do have understanding of the relations between thoughts and things, some research indicates that they do hold magical beliefs in mental-physical causality. A number of the characteristics that are considered to lead to magical thinking in adults are exactly those that are often thought to provide the basis for the emergence of and prevalence of magical thinking in children: lack of information, conditions of uncertainty, and inability to explain phenomena (Jahoda, 1969; Zusne & Jones, 1989, cited in Keinan, 1994).

Early research found evidence that not all children's thinking is systematic, logical, or scientific. According to Piaget (1929, 1930, cited in Woolley *et al.*, 1999), young children engage in illogical, magical thinking, as they lack an awareness of the distinction between mental and physical. This results in them believing that they can cause some event merely through their own thoughts (such as wishing), or gestures. Piaget's interviews with children suggested that such beliefs are present until 11 or 12 years of age.

Subbotsky (1997) states there are two types of causality – psychological and natural-physical. The former is a kind of causality which involves a person's wish or thought producing certain physical events either in a normal way (e.g. moving one's body) or via magic, and the latter involves interactions between physical events. He also claims there to be a third type of causality – phenomenalist causality. Phenomenalist thinking is a rather persistent mode of coping with unusual physical phenomena, for example, when two events connected by associations happen at the same time but a person cannot give a sensible explanation for the connection. Thus, he states that it can be assumed that individuals would be more inclined to produce phenomenalist causal judgements for an unusual phenomenon if it is difficult to give an immediate physical explanation than if it is easy to give such an explanation. In support of this, Rosengren and Hickling (1994) found that four and five year old children gave significantly more magical explanations for extraordinary

events (like a car changing its colour if dipped in hot or cold water) than for commonplace ones (like blowing air into a balloon) after seeing the events happen.

There is an increasing amount of research which has emerged in the last ten years exploring children's thinking about magic. Harris (1994) states that

magic involves anomalous physical movements (e.g., a magic wand that passes through an apparently solid barrier), anomalous biological changes (e.g., a frog that turns into a prince), or anomalous psychological causation (e.g., a fantasy that impinges directly on reality). Furthermore, children are exposed to a wide range of magical events ranging from being encouraged to participate in ritual practices such as placing a tooth under a pillow, or making a wish, as well as being subjected to stories and films about ghosts and monsters. Only when children understand what is ordinarily impossible can they appreciate those magical practices and supernatural beings possess extraordinary causal powers.

Recent research has provided some evidence for children's beliefs in the reality of supernatural beings (e.g. Harris, Brown, Marriott, Whittall, & Harmer, 1991). Furthermore, evidence suggests that children have trouble differentiating fantasy from reality (Subbotsky, 1993) and maintain beliefs about magic beings as well as magical events (Johnson & Harris, 1994; Rosengren & Hickling, 1994; Woolley & Phelps, 1994). Studies have repeatedly shown that young children are willing to label impossible or unexpected events as "magic" (e.g., Chandler & Lalonde, 1994).

In examining the degree to which children engage in magical thinking, Rosengren *et al.* (1994) suggest that this involves a number of different facets, including parental input, children's spontaneous beliefs and children's responses to magical events. They have also found that young children make a sharp distinction between possible and impossible events, yet leave open the possibility of certain extraordinary events. While four and five year old children did not accept the notion that animals could be made smaller or undergo changes in shape, they did accept the idea that a magician could bring about these changes,



Children watch fairies dancing and creating a fairy ring



without resorting to tricks and deception.

In contrast, Chandler and Lalonde (1994) have found that three and four year olds quickly shift from explanations in terms of magic to explanations in terms of trickery when allowed repeated viewing of an unusual event. They postulate that skepticism towards magic may

increase when children enter formal schooling and are placed in a social situation where rational, scientific thought is encouraged and fantasy is either discouraged, or confined to stories and books. As children age, parents may shift from encouraging certain beliefs to providing evasive responses to children's questions about magical characters, or even stating that certain entities are not real. Also, children might question the reality of these figures as they are confronted with inconsistencies in parental reports, for example, finding presents hidden away before Christmas, or seeing multiple representations of Santa, and as they gain knowledge about the physical world, for example, learning the tricks involved in magic. Support for this interpretation comes from Woolley *et al.* (1999) who found that older children (aged five to six) are more skeptical about the efficacy of wishing. They are less likely than younger children to report that wishes come true, both hypothetically and with regard to their own wishing abilities.

To what extent do children really believe their imagination creates reality? There is much debate over children's understanding of the distinction between fantasy and reality. Harris *et al.* (1991) presented evidence supporting a fantasy-reality confusion in children, while Golomb and Galasso (1995) claimed that children were able to differentiate between real and pretend entities.

Taylor (1997) suggests there are many different fantasy/reality distinctions requiring different sorts of insights and that any global claim about children's understanding of fantasy and reality may be misleading. For example, children's belief in fantasy characters such as Santa Claus should not be taken as evidence that they are generally confused about fantasy. Children are told about them in the same way they are told about characters and events that are real and they are provided with concrete evidence that they exist. There is also a possibility of undesirable consequences if one fails to believe (for example, maybe no toys will be left under the tree!).

In conclusion, there seem to be interpretative problems within the "magical" literature, regarding children's belief in magic. Chandler and Lalonde (1994) state that this is the result of past failures to differentiate

between children as prone to "magical thinking" versus being prone to think about the possibility of magic. Indeed, the incidence of actual first order "magical thinking" gradually declines as children grow older, while second order "thinking about magic" may increase with advancing age (Wellman, 1990, cited in Chandler & Lalonde, 1994).

However, Rosengren and Hickling (1994) point out that the real issue is the extent to which children truly believe that supernatural events and magic are possible. Children may merely use "magic" to label certain events that they see as extraordinary. When children use the term "magic", it is unclear whether they are referring to "tricks" as in parlour magic, or whether it reflects a belief in the possibility of extraordinary or supernatural events. It is apparent that this area of children's magical belief needs to be investigated in greater depth.

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Rhyme and Reason

Steve Donnelly

Stars in my eyes

IT SEEMS TO ME that astronomy is the science for which the public feels the greatest affinity. This became obvious to me when working as a scientist for the Australian government, at a time when almost all scientific research was having to justify itself in terms of its commercial relevance to society (as is now largely the case in the UK). However, the one exception to this was astronomy, in particular radio astronomy – a field in which Australia was (and still is) a strong player. Australian politicians were aware that the taxpayers who might well query the usefulness of spending their money on pure scientific research also occasionally looked up at the night sky and wondered at the beauty and immensity of the universe. Astronomy is an accessible science in which non-scientists can, and do, participate – either actively, through amateur astronomy groups, or passively by watching TV documentaries and perusing beautifully illustrated books on the cosmos.

On the basis that a population which is moderately well-informed about a topic is less likely to be taken in by related pseudoscientific theories, it is rather surprising to me that the most popular pseudoscience is astronomy's retarded sibling, astrology. Of course, they share a common origin and began as an observational science with which man attempted to make correlations between signs in the heavens and events on Earth. But portentous signs were not just confined to the heavens – many other systems of divination also existed, the reading of animal entrails being another popular one. Since those common beginnings, however, astronomy has undergone drastic development and revision. Astrology, on the other hand, has remained essentially unchanged since its childhood and, in this sense, it seems to me that astrology has little more to offer than the reading of entrails. Of course, astrologers will say that astrology is a complex science and that its practitioners must undergo long periods of training. But entrail reading was also complex and, had it survived, would presumably by now have been codified into a detailed systematisation of the significance of different arrangements of loops of intestine.

In a welcome departure from the usual practice of the broadcast media to allow proponents of various paranormal disciplines to air their views, which are then briefly criticised by a token skeptic, I recently participated in a television programme on astrology in which the arrangement was the other way round. On the BBC's *Heaven and Earth* show at the beginning of the year, I was invited to film a skeptical polemic on astrology, in which I presented the views outlined above (including the entrails). On this occasion, an astrologer (Roy Gillett, president of the Astrological Association) was invited to comment on *my* views.

I should say (and did say on the programme) that as an experimental scientist, my main objection to astrology is not its origins, or even the lack of credible theoretical mechanisms whereby a distant planet could influence my character. No, my real objection to astrology is simply the almost total lack of experimental evidence to support it [1]. If astrology had any light to shed on our characters, as proponents claim, then when a character description was obtained from a person's detailed astrological chart it would be reasonable to suppose that the person, or those close to him, would be able to distinguish between this description and two randomly selected ones. In fact, it has been clearly shown that people do not identify their own astrologically-based character descriptions with a success rate greater than chance [2].

With this personal interest in experimental data, in my polemic, I issued a challenge to astrologers, based on a suggestion by Culver and Ianna [2]: to attempt to determine the marital status of couples in a group in which half were still married and half were divorced, given only their times and places of birth. To my great surprise and delight an astrologer by the name of Graham Birchmore rang in to accept my challenge. Graham ran the UK's first astrological dating agency and believes that he has found astrological correlations that will enable him to achieve a high success rate in my proposed test. Over January and February, we have been sorting out precise protocols for the experiment, for which the BBC has agreed to be the neutral collector of data. I have been very impressed by Graham's willingness to put his theories to a rigorous scientific test – this is in stark contrast to one well-known astrologer who retreated behind the word "symbolic" (sym-bollocks?) when asked to explain his "art" on another television programme last year.

So: watch this space. I hope that the experiment will be carried out some time over the spring and early summer with the results being broadcast by the BBC. I will give a detailed account of the experiment and its results in the issue of *The Skeptic* following the broadcast. Keep your fingers crossed for me (or engage in any other similar luck-bringing activity). It would be ironic, would it not, if the first unequivocal evidence that astrology works were to be published in a skeptical magazine?

Notes

[1] I avoid here discussion of the contentious findings of Michel Gauquelin

[2] R. B. Culver and P. A. Ianna, *The Gemini Syndrome*. Prometheus Books (1984). Rereleased as *Astrology: True or False?*

Steve Donnelly is a physics professor at the University of Salford and a joint editor of *The Skeptic*.

Philosopher's Corner

Julian Baggini



Believe nothing

"PHYSICIAN, HEAL THYSELF" is one of the most reassuring expressions in the English language. To turn the table on our critics, to show them that they do not live by the standards they preach, is one of the sweetest forms of *Schadenfreude* available to us.

In critical thinking, a specific form of this argumentative technique is known as the "partners in guilt" move. It works by showing that your adversaries' arguments contain the same flaws as the arguments they themselves criticise. So, for example, crude relativists, who say that there are no absolute truths, are criticised on the grounds that if they are right then the statement "there are no absolute truths" is not an absolute truth. Any relativist worth his salt will come back with a more sophisticated response to this, but as a rebuttal to the sloppy relativist on the street, it's still pretty effective.

Skeptics of all shades are familiar both with using this technique and with being on the receiving end of it. Atheists (aka extremist religious skeptics) have to put up with having religious people tell them they've got nothing to feel superior about, since God's non-existence cannot be proved and therefore atheism is itself a matter of faith.

As an objection to atheism, this is pretty hopeless. To have faith is to positively believe in something in the absence of positive evidence that it exists. To not-believe something is therefore, not to have a faith that something does not exist, but rather to lack faith that it does. The asymmetry is important. It does not require faith to not-believe in the absence of evidence. I need no faith to refuse to believe that Elvis lives on Mars, for example. I don't believe it because I haven't been given any reasons that persuade me I should.

A general complaint against skepticism is that to be a true skeptic you need to be skeptical about your own skepticism. This is as hopeless as the jibe against atheism but, for different reasons, too familiar, I am sure, to rehearse in any detail here. Suffice it to say that if skepticism is defined as an attitude that demands good reasons before assenting to any belief or judgement, any true skeptic can and should remain cautious about all beliefs. This caution can extend to the belief that the skeptical attitude is the right one, which means one can remain a skeptic until it is demonstrated it is better not to be. No problem.

Only there is a problem of sorts. If you are in the business of being critical, the chances are you're more skilled than most in dishing out and rebutting criticism than your detractors are. The lame objections to atheism

and skepticism outlined here typify the low quality of most criticisms levelled against skeptics.

But the consequence of this is that it is easy to get a little too confident, smug even, about the intellectual superiority of one's own position. And then, one day, you wake up and discover that as a matter of fact you have ceased to apply the standards of skepticism you apply to others to yourself. You've been hoisted by your own petard, not because of any fundamental contradiction in the skeptical position but because of plain, stupid, human arrogance.

Something like this may have happened in Anglophone philosophy. According to philosopher Simon Glendinning, philosophy in Britain made the mistake of taking all that could go wrong with philosophy and attributing it to those thinkers working on mainland Europe. Brit philosophers were aware that philosophy could be empty, sophisticated and obscurantist, but they thought all that kind of philosophy was being done by other people. Meanwhile, in good old Blighty, we were going along just fine, thank you very much.

Another philosopher, Stephen Mulhall, argues something similar. Somehow, British philosophers forgot that they have to take up a critical attitude to the foundations and methods of their own subject, just as they take up a critical attitude to the foundations and methods of other disciplines and everyday assumptions. Incredible as it may seem, they simply forgot to apply their own standards to themselves.

A third philosopher, Jonathan Rée, says that the thing one mustn't forget in philosophy is to bring home the lessons of doubt to oneself. Put plainly, it sounds platitudinous. Of course that's what you do, schmuck! But how easy it is to have a blind spot when it comes to yourself.

What's most worrying for people like me, who do not count themselves among the very sharpest minds in the land, if not the street, is that truly brilliant thinkers seem just as liable to fall into this trap. Reading the second volume of Ray Monk's brilliant biography of Bertrand Russell, you are struck by how Russell came to assume that, since he was officially a very Clever Bloke, he could churn out writing on any subject under the sun. The result was a stream of drivel. Russell had the ability to spot poor argument when he saw it, but not, it seems, when it came to his own later work.

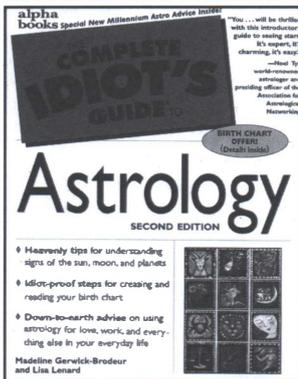
So when non-skeptics tell us we have to be skeptical about our own beliefs, we could dismiss this as a weak objection, but would be better seeing it as a reminder of a perennial truth. Especially if you think this picks up on a flaw in others which you don't suffer from yourself.

Reviews



STAR CHUMPS

The Complete Idiot's Guide to Astrology,
by Madeline Gerwick-Brodeur and Lisa Lenard
Alpha Books, £12.99, ISBN 0028639693



Having expected a rather vague overview of what makes a Leo a Leo and a Scorpio a Scorpio, I was very pleasantly surprised with this book. From the outset the authors invite us to “get onboard” for a journey through the ins and outs of astrological readings. The book begins with a comprehensive introduction to astrology, including the

history behind it and information about various famous astrologers of the past (including the three wise men, Pythagoras and Isaac Newton, apparently). The reader is then introduced to “astro-lingo” (cusps, houses, etc.) and provided with an in-depth analysis of the traits associated with each astrological sign which even includes a list of important body parts (lucky old Scorpio – you get the genitals). Next, the reader is shown how to calculate and interpret their own birth chart and is informed about the various ways in which astrology is connected to everyday life: “Here you’ll learn about Moon phases and how to use them to have the best garden in town”. Other chapters include information on psychic intuition, moon phases, numerology, palmistry and tarot.

For believers in astrology, this informative book will be an absolute delight. For someone like myself, with a more skeptical approach to astrological insights, this book is also well worth a look as an example of a perfect cold reading manual. In addition to its practical use, the book is also highly entertaining, very well thought-out and very well presented and illustrated. Mini-guides of this and other *Idiot's Guides* can be downloaded free for those who are interested by logging in to <http://www.idiotsguides.com>.

Kate Holden

EARTHLY HORRORS

Living Terrors: What America Needs to Know to Survive the Coming Bioterrorist Catastrophe,
by Michael T. Osterholm and John Schwartz
Delacorte Press, \$24.95, ISBN 038533480X

It's hard to know why people feel they have to go to horror movies in order to scare themselves silly when they can just read this book. Perhaps it's more comforting to be scared at something fictional.

Michael T. Osterholm is the former Minnesota State epidemiologist, and bioterrorism is his specialist field. John Schwartz is a reporter at the *New York Times* (though he was still at the *Washington Post* when he co-authored this book). Together, they lay out in calm and rational detail what would happen in case of a mass release of smallpox, anthrax, or another of the ferocious killer bugs. Between the explanations of the lack of preparedness of local medical facilities and the conflicting needs of medical and law enforcement personnel are fictional scenarios of just how such a catastrophe could occur. It's a shocker to find out, for example, that you somehow missed the news that there are more stocks of the smallpox virus than just the couple of lab samples they were talking about destroying less than a decade ago. Television news in this country always likes to reassure viewers at the end of such scenarios that “it can't happen here.” Until some bright reporter on one of the nationals starts going around and asking questions, we won't know. One suspects that at least some parts of their scenarios could. Just-in-time inventories, for example, are as common in British business as in US business, and cost-saving lower levels of inventory affects everything from the availability of hospital beds to stocks of vaccines and antibiotics.

For skeptics, this book has two interesting aspects. First of all, it takes a look at the practical consequences of the confused relationship between science, politics, and the media. Second of all, it's a reminder that there really is an answer to the question skeptics are often asked: does it matter if someone believes in astrology/mediums/ghosts/faith healing? If it's comforting to them, does it really matter if it's true? Reading this book reminds you that the answer is yes. If you have no rational understanding of how the world works, you can't make intelligent decisions to avert or manage a crisis.

Wendy M. Grossman

KNOWING THE ANCIENTS

The Crystal Sun: Rediscovering a Lost Technology of the Ancient World, by Robert Temple
Arrow, £7.99, ISBN 0-09-925679-7

It's a characteristic of our era that we tend to believe that we must be a lot smarter than our ancestors. Although this habit of mind is often blamed on the 1960s and that decade's legacy of questioning authority, it's also true that every generation of youngsters believes its parents know nothing.

This may explain why the existence of the hundreds of lenses that Robert Temple has unearthed in museums throughout the world has never acted to discredit the notion that the ancient world knew nothing about optics. To a non-expert, at any rate, this massive tome is impressively documented and entirely credible in

identifying magnifying lenses. More fantastical is Temple's material on burning mirrors, lenses assembled in such a manner as to focus a "death ray" of light on enemy ships. I am less comfortable with his discussion of mathematical constants and their influence on music; he may be correct, but musicians don't play by working out mathematics.

Temple has written controversial books before this, notoriously *The Sirius Mystery*. In this case, the research seems to be solid in support of his central claim, that because we "know" the ancients didn't have optics research until now has misinterpreted the evidence. For skeptics, whether Temple is correct or not, it's a fascinating story. Either it's the story of centuries of misguided researchers who saw only what they expected to see. Or it's the story of an obsessive researcher who spends years convincing himself that the accepted wisdom is all wrong. Given the documentation and the photographs, my bet is that Temple is at least right about ancient optics, though his interpretations of ancient stone circles are less clearly supported.

To make this, the paperback, a reasonable size, Temple has omitted the many pages of scholarly references that appeared in the hardcover edition.

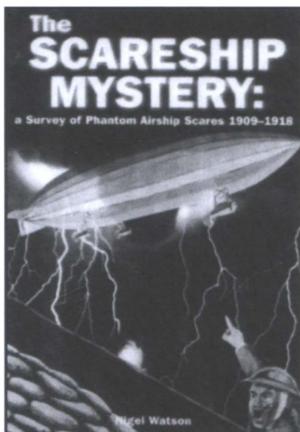
Rachel Winston

IN THE AIR AT NIGHT

The Scareship Mystery, by Nigel Watson et al

Domra Publications (65 Constable Road, Corby NN18 0RT), £9.95, ISBN 0952441780

When a 13-year old girl tells you she's just been talking to



the Virgin Mary, when a suburban housewife describes how she was abducted by aliens, it's easy enough to be a skeptic.

It gets tougher when half a dozen people, independently, describe what seems to be the same haunting ghost. And it gets very tough indeed when hundreds – thousands, maybe – of people come forward as

witnesses to strange objects crossing the skies. Yet this is the challenge presented by the "scareships".

The phenomenon is already well documented. There's a sizeable literature on the American airship sightings of the 1890s, and Bartholomew and Howard subtitled their overview of pre-UFO scares "two centuries of mystery". What Watson and his fellow-authors have done is to focus on specific waves of sightings in Britain, New Zealand, Canada, South Africa and WW1 America. Their findings are staggering. Hundreds of people in all walks of life – ships' captains, night watchmen, coastguards, airmen, policemen, and ordinary people going about their daily business – report, often in considerable

detail, seeing flying machines where no such machines could have been.

Simple enough, to say they were mistaken. (As, of course, skeptics did at the time.) But that does not explain delusion on such an epidemic scale. Delusion we can, with some confidence, say that it must have been, because in a great many cases investigation followed, establishing to a fair degree of certainty that no such aircraft – even if such an aircraft existed – could have been at such a place at such a time. During most of the periods studied by the authors, aircraft were few and far between: for instance, the number of Zeppelins – the craft most frequently held responsible – was small, every flight recorded, their movements easily checked. Again, when in September 1914 German spyplanes were reported in many parts of South Africa, the facts are "that one Aviatik biplane was available to terrorise the whole of the Union of South Africa".

Watson and his co-authors have not attempted to go deeply into the psychosocial roots of the phenomenon, nor do they propose any blanket explanation. The most they do is to indicate which paths might lead to an understanding of so widespread, and so recurrent, a delusion. What their splendidly researched book does is to document, with hundreds of examples, the process of delusion. Confident, as I think we may reasonably be, that every one of these witnesses was not seeing what they thought they were seeing, we must ask ourselves what limits, if any, distinguish the deluded from the doubters? Can we be sure that, looking up into the English skies in 1909, in New Zealand in 1909, in South Africa in 1914, in Canada in 1915, we too might not have seen one of these scareships of the mind?

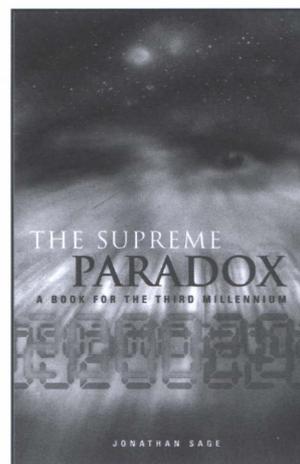
Hilary Evans

PRESENT INDICATIVE

The Supreme Paradox: A Book for the Third Millennium, by Jonathan Sage

The Book Guild Ltd., £14.95, ISBN 1857764390

Sage, an ex-solicitor, regales us with the fruits of his retirement in Mallorca. Unfortunately, these musings are a good deal less brilliant than his chosen niche.



The first part of the book summarizes the works of various philosophers, from Plato to Jaspers. Sage's favorites are broadly in the idealist tradition. Readers untrained in philosophy may well be unfamiliar with names like Royce, Alexander, Bosanquet, Croce and Bergson.

If they are familiar, it may then come as a shock to find themselves dealing with karma, astrology, and the Akashic Record. Akasha, he explains, "is Sanskrit, meaning the etheric, electro-magnetic and spritual essence of the

Universe." We may wonder what is the Sanskrit for neutrino, or uranium.

There is no effort to show how the philosophers he parades before us differed in their reasonings, how they detected inconsistencies in their predecessors' work, how they criticized rival theories. All we get is a hoard of "indications" that the ramblings of Ouspensky were on the right track, for he turns out to be the main focus of the last part of the book, where we find handy clarifications like the following:

In the fourth dimension, where motion begins and where time is the measure of motion, we only have a partial sensation, an incomplete perception of motion. (p.130)

Time, being measured by motion, is therefore also relative. (p.131)

There is of course no room for anything from neuroscientists or Darwinists. The paradox of the book is to have spent all that time reading philosophy without learning how to develop coherent theories.

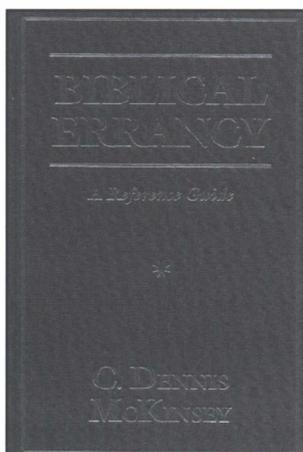
Paul Taylor

GETTING IT WRONG

Biblical Errancy, by C. Dennis McKinsey

Prometheus Books, \$130, ISBN 15739-9089

Our American cousins not only take religion seriously, but take combatting religion seriously.



This 852-page tome is a resource book for the kind of person who rather than shut the door in their face, likes to debate with Jehovah's Witnesses, Christadelphians and others who believe the Bible to be the infallible word of the Judeo-Christian God. It is not a fun book: it is an armoury of weapons, defensive and offensive, whereby the chapter-and-

verse fundamentalist can be confounded, the believer abashed. Fun, no, but much malicious pleasure for those with a taste for exposing the emperor's nakedness.

For example, "Testing the Bible" offers an agenda of potential experiments which would prove/disprove whether Jesus was capable of being mistaken. The truth of Jesus's words "Knock, and it shall be opened unto you" could be proved/disproved scientifically by practical demonstration: born-again Christians could be tested by taking them into the nearest desert to verify whether or not "He that believeth in me shall never thirst".

The section on unfulfilled prophecies is, alas, a record of disappointment. "Thine eyes shall see Jerusalem as a quiet habitation" is still a distant prospect after two and a half millennia, as is the day when "violent men shall afflict them [the Israelites] no more". Health standards have yet to reach the point where "the child shall die a hundred years old".

But we can be glad that Isaiah missed the mark when it came to astronomical predictions: we could perhaps bear for the light of the moon to be as the sun's, but if the sun's light were to increase sevenfold, as he assures us it will, the only beneficiaries would be the oculists and the manufacturers of sunglasses.

For most of us, this will be a browsing book: here are 23 awkward discrepancies in the accounts of Jesus's trial, there are several pages of Bible quotations showing that Jesus is not God, elsewhere a handy checklist of creationism and ways to eat Jesus. Seventy-two scientific impossibilities is thought-provoking indeed (hares don't chew the cud, pi is 3.000, etc) but the section I personally enjoyed most is "Quotations" – comments on the Good Book from skeptics of all time: such as this from Robert Ingersoll: "The time will come when mankind will wonder that such a book was ever called inspired". Let us hope that some day, this particular prophecy will be fulfilled.

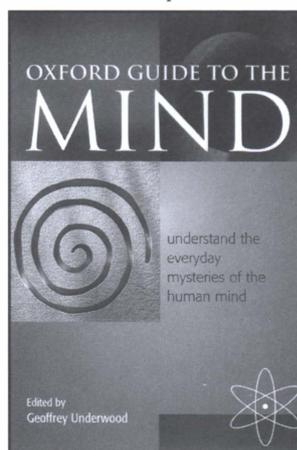
Hilary Evans

MIND MATTERS

Oxford Guide to the Mind, by G. Underwood (Ed.)

Oxford University Press, £9.99, ISBN 0198600836

This is a compilation of articles from the much larger



Oxford Companion to the Mind (ed. R.L. Gregory), selected and grouped according to six "themes": The Software of the Mind; The Hardware of the Mind; Brain, Mind and Consciousness; When Minds are Damaged; Disturbed Minds and Minds in Action.

Each article is by a different (often eminent) author but, while this was a strength of the large-scale *Companion*, in the present slim volume

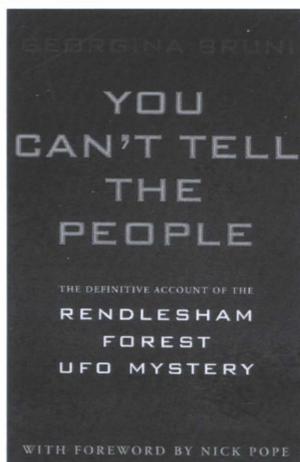
the constant changes of style add to the already fragmentary feel of the selections. The science – and much of the writing – is of a high standard, but it is difficult to envisage the likely audience for this book. It is too selective to serve as an encyclopaedia (as the *Companion* did) and as a general account of modern psychology for non-specialists or intending students, it is not clearly preferable to many of the general introductory texts available.

It is probably best seen as a "taster" for those seeking some flavour of contemporary psychological theory and research. From the skeptic's point of view, the most relevant chapters are those on "Mind, Brain and Consciousness", where there are brief sections on dreaming, hypnosis, the mind-body relationship and psychosomatic illness but, even here, there is little direct discussion of the particular aspects of psychology most likely to interest readers of *The Skeptic*. There is a reasonable index (for a book of this size) but no references to sources or to further reading.

John Gillies

A MYTH IN THE MAKING

You Can't Tell the People, by Georgina Bruni
Sidgwick & Jackson, £17.99, ISBN 0283063580



The Rendlesham Forest UFO case of December 1980 has been termed “the world's first officially confirmed UFO landing and contact” and, more succinctly, the British Roswell (a reference to the celebrated American location where an alien craft allegedly crashed over 50 years ago). In truth, Rendlesham is far better than Roswell – not just one but at least two supposed landings outside the front-

line US Air Force base at Woodbridge in Suffolk that were witnessed by US Air Force security policemen, including a high-ranking officer who described what he saw into a dictaphone. Marks on the ground, damage to the surrounding trees and traces of radioactivity all added to the puzzle.

What substantial – and, above all, reliable – new information about such a well-known case can be gleaned after an interval of 20 years? Not much, of course, but it's too good a story to let die. Roswell already is a myth; Rendlesham is a myth in the making.

In this book, Georgina Bruni, an Internet gossip columnist and enthusiastic chronicler of the paranormal, has performed a useful service by documenting the way in which the case came to public view following initial local rumours and tip-offs from servicemen. Bruni has been energetic in tracking down numerous people who were on the base at that time who had never been interviewed before. Perhaps her greatest scoop is to publish, for the first time, photographs of the supposed landing site, in a gap between pine trees within sight of the eastern edge of the forest.

The standard skeptical explanation of the case is summarized at: <http://www.debunker.com/texts/RidpathRendlesham1.html> Bruni herself is far too eager for mystery and intrigue to be bothered with such killjoy rationalizations. She plumps for “a craft of unknown origin”, apparently stopping off while time travelling.

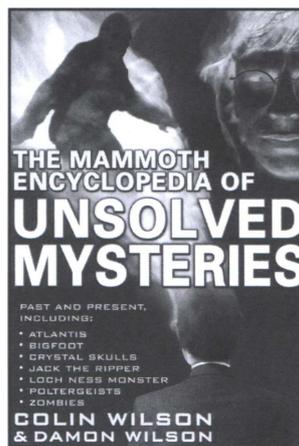
You Can't Tell the People, titled after a remark to the author from Margaret Thatcher, is ultimately unsatisfying because of the inconsequentiality of much of what is offered as evidence. The overall impression is that no one at higher levels in the Air Force or government took the Rendlesham sightings at all seriously at the time – and this book is not going to change the official view, despite what

Bruni may hope. The key to this case may yet lie with the witnesses she was unable to trace or who have declined to talk. Perhaps the real moral of the tale is that it demonstrates what can happen when belief in UFOs becomes widespread in the US Air Force.

Ian Ridpath

FACE VALUE

The Mammoth Encyclopedia of Unsolved Mysteries,
by Colin Wilson and Damon Wilson
Robinson, £7.99, ISBN 1841191728



Six hundred and sixty two pages (pity it wasn't 666!) of rather small print on rather poor quality paper does not make this an immediate pleasure to read and there are no illustrations.

One is informed that also available in the series are the Mammoth books of Historical Erotica, Lesbian Erotica, New Erotica and various other eroticas and non-eroticas! The authors state that “This book contains most of the chapters from two earlier works”

which somewhat explains the repetition of subjects and material that one may have encountered before.

Sixty three “of the most intriguing phenomena of all time” are discussed including (from the front cover): Atlantis, Bigfoot, Crystal Skulls, Jack the Ripper, the Loch Ness Monster, Poltergeists, and Zombies. There is a disproportionate amount of space devoted to each. For instance, “The Devil's Footprints” and “Where is the Mona Lisa?” only receive four pages each, whereas “Vampires” and “Homer and the Fall of Troy” are rewarded with twenty nine and twenty two pages respectively.

However, these criticisms aside, the authors have produced quite a balanced viewpoint of the stories they have discussed. They set out to present what was reported by the people involved in the cases rather than making sweeping statements about the veracity of the information. They have also brought up to date some of the information by adding additional paragraphs to passages from previous publications. A hardened sceptic might reject the material as unworthy of investigation, but I believe this would be as bigoted as believing everything one reads about fairies and “things that go bump in the night”!

The lack of references or a bibliography will not allow the book to be acceptable as an academic source, but it is written in a readable style which should be popular with the general public. Reasonable value if taken at face value.

Dr Melvyn Willin



LETTERS

God in Mind

Re the article "Locating God" by Barry F. Seidman (*The Skeptic*, 13.3-4), I wonder if he is mixing some entirely unmixable substances. Science cannot be expected to prove or disprove the existence of God; this is the province of faith. Many scientists believe in God, and many believers have become scientists.

And to wallow in the further reaches of morbid psychology is surely most unrewarding. Most religious people do not hear voices or see visions, though even here we must surely be careful when considering people who have. Mahomet may well have had a worthy desire to rid his country of degrading polytheism and human sacrifice. Joan of Arc's wish to rid France of the invading English was a national, patriotic stance. More recent was the case of a slave ship captain who claimed to hear the voice of God telling him to renounce that dreadful profession, which he duly did. Was this not his long-suppressed conscience at last asserting itself? In none of these cases do we need to posit either the supernatural or brain malfunction.

As to the assertion that belief in God arose from a desire to survive physical death – well! I always understood that belief in a God or Gods most likely originated when our remote ancestors personified the forces of nature – the rain, the sun, the wind – all of which were important factors for their hunting and cultivation. Belief in any sort of survival must have come a lot later, and, as some of the Greek and Roman poets have written, a shadowy existence in a dim underworld was not altogether desirable. Furthermore, the early chapters of the Jewish Bible make it clear that there was no afterlife at all – when you died that was the end of you.

Conversely, Buddhists believe the soul moves around in many incarnations but do not believe in a God or Gods at all.

*Elsie Karbacz
Colchester, Essex*

We have to recognise one major difficulty before we begin to discuss Barry F. Seidman's question (*The Skeptic*, 13.3-4), "Is God hardwired into the human brain?" It is that when the first Jesuit missionaries originally arrived in the court of the then Chinese Emperor they discovered that the Chinese language contained no ideograph for the concept of God. So the best they could do when they wanted to translate Christian writings into Chinese was to employ the ideograph read as "Tian" as equivalent to the word "God". Its non-equivalence is most strikingly demonstrated by the fact that the militantly atheist Communist rulers of China are content to conduct both massacres and major military parades in Tiananmen Square.

Seidman goes on more happily to suggest that religion "provided local tribal leaders and, later, kings, queens, and emperors with a way to control the masses." Plato, in *The Republic*, seems to have been the first to suggest that the social function of beliefs about both the gods and a future life is to assist in sustaining good order and discipline. Plato's notorious great uncle Critias maintained that these ideas and the social institutions of which they are essential elements were originally created for that purpose by some culture hero, leaving it to social scientists – millennia later – to show how in fact they must have evolved as the unintended consequences of extended human actions.

*Antony Flew
Reading*

The doorbell knocks twice

I read with interest Steve Donnelly's "Rhyme and Reason" in which he tells us of EVP and a "paranormal bell ringer" (*The Skeptic* 13.3-4).

A few years ago, my girlfriend experienced an identical problem to the one described by Steve. She bought for her student flat a radio-

signal doorbell (very similar to the one photographed for the article) which then regularly and mysteriously rang last thing at night and early in the morning.

Unlike Steve, though, she and her flatmates did find the cause of the problem, albeit after several weeks of puzzlement. It transpired that the ringing of the doorbell always coincided exactly with switching off one particular bedside lamp (which, of course, accounted for the timing of the phantom caller).

I was skeptical when she first told me this and quizzed her on how she supposed an electrical lamp could trigger a radio-signal doorbell. Her reply was, "How would I know? I'm studying dentistry, not electronics." It seemed a fair point to make. After witnessing several demonstrations, I realised that she was correct about the lamp and would, therefore, recommend that Steve follow a similar line of investigation. Being no more technologically gifted than my girlfriend, I can't begin to explain why the lamp was causing the bell to ring, but there would seem to be a scientific answer available. No doubt someone at the *The Skeptic* will get to the bottom of the matter. Whatever. The important point is that EVP seems unlikely to play a role in the explanation... unless, of course, dead people are expressing themselves through the medium of bedside lamps.

*Stephen Coutts.
By email*

Steve Donnelly's report on messages hidden in the EVP recordings reminds me that one need not go to the extraordinary pains of recording and trying to discern words in the white noise. My inkjet printer complains quite clearly by every sweep of the printing head: "enough, enough, enough, ..."

*Lassi Hyvärinen
Divonne les Bains, France*

Blowing hot and cold

I was delighted to read Lewis Jones's article ("Global Warming? Chill Out", *The Skeptic*, 13.3-4). It is good to be reminded that the global warming scenario can be challenged. We are seldom allowed to hear the "contrarian" view and when we do, those who disagree with the environmentalists are invariably denounced as lackeys of the oil industry. As Jones says, in fact they include some of the most senior climatologists.

There are a couple more points Jones might have made, given a little more space. Siberia is currently experiencing its coldest winter for several decades. North America has just had its coldest November and December for very many years. And it is also interesting to note that when ice ages end, the associated rise in atmospheric carbon dioxide concentrations invariably follows the warming, rather than preceding it. Of course, the beauty of the global warming theory is that it explains absolutely everything, including phenomena you might think contradicted it.

*Michael Allaby
Argyll, Scotland*

This morning I read both a news report headed "Global warming now 'unstoppable' scientists warn", detailing the dire consequences of rising global temperatures in *The Independent*, and Lewis Jones's article "Global Warming? Chill Out" in *The Skeptic*, arguing that global warming is a good thing. The former cites "Sir John Houghton, the British scientist...who has fought to keep the IPCC [the United Nations Intergovernmental Panel on Climate Change] politically neutral and scientifically rigorous" while the latter attacks "econuttery", "ecothologians," and political bias on the IPCC, together with citing Ben Bolch and Harold Lyons, the "old guard of socialists and economic planners" who have reinvented themselves as "eco-socialists".

Quite aside from the fact that Jones seems to be exposing the biggest conspiracy in history, namely the usurpation of global politics by "ecosocialists", this latter allegation caught my eye, coming as it does from a couple of American academics.

Confirmation came with the quote on page 19: "They [Bolch and Lyons] characterise Al Gore's campaign strategy as simply 'Vote for me or you might die'." Could it be that the book that Jones has swallowed wholesale is Republican propaganda, designed to bolster George W. Bush's oil interests? Is Jones's article an updated version of the old "Reds-under-the-bed" scare, only with the evil communists bent on world domination reinvented as mad environmentalists bent on world domination? Has he not noticed that, according to Bolch and Lyons, the vehicle for these world conquerors is the United Nations, and does this not strike him as odd in view of so many right-wing Americans' belief that the UN is bent on world conquest and destruction of the American way of life?

Frankly, if the global-warming prophets-of-doom serve a political agenda, so do their rivals, and if one deserves skepticism, so does the other. Lastly, a question for Jones: is Sir John Houghton an "econut", an "ecothologian", or an "ecosocialist"? Clarification, please.

*Nick Campion,
By email*

Foo fighters – or stars?

David Hambling claims ("Flying Saucers of the Third Reich," *The Skeptic* 13.3-4) that an official investigation into "foo fighters" over Europe "drew no definite conclusions." According to R. V. Jones, who was Director of Scientific Intelligence (*Most Secret War*, p.510), such scares arose during the war "by imagination of men under strain interpreting fearfully observations which had a natural explanation." This seems pretty definite; it is not a claim that "foo fighters were the result of misidentification of other aircraft or, in some cases, mass hallucination" and it does not "rule out" natural phenomena. Hambling could have mentioned that similar objects were reported from the Japanese war theatre and (later) from Korea. A special US mission to Korea saw no such "foo fighters", although they did identify one such object as the Moon. Menzel and Taves (1977) pointed out that mirages of bright stars or planets can produce similar effects.

Almost certainly "foo fighters" were bright stars or planets at an

altitude low enough to be mistaken for an aircraft. There is no cause to claim that they were caused by ball lightning, itself a phenomenon of doubtful existence which should appear only during stormy weather ("foo fighters" were invariably reported during clear weather). If ball lightning has caused "a tiny hole" in a solid object, I am not aware of it; most reports of ball lightning are confused and mistaken and the properties Hambling lists are mythical.

*Steuart Campbell
Edinburgh*

As David Hambling reminds us, Hitler described the V-2 rocket in 1943 as the decisive weapon of the war. But it was not afterwards that he started boasting of "a secret weapon". He had been doing that for years. We wrinklies remember a George Formby song dating from 1939, "The Maginot Line," which includes the lines, "Hitler can't kid us a lot./His secret weapon's tommyrot./You ought to see what the sergeant's got."

*Donald Room,
London*

Indecent proposal

I was most interested to read in the letters page of your last issue that Professor David Fontana of the Society for Psychical Research, London, felt that there were definite indications of possible psychic activity in what is referred to as the Scole Effect.

Can I suggest that he arrange for this group to take the million-dollar challenge set up in the US to demonstrate this type of activity and if not explain why not?

The James Randi Educational Foundation will pay the sum of US\$1,000,000 to any person or persons who can demonstrate any psychic, supernatural, or paranormal ability of any kind under satisfactory observing conditions. Such demonstration must take place under certain rules and limitations which are agreed by both parties in advance. The Group is expert in setting up such demonstrations, and so far all have failed the challenge. Full details can be found on Randi's Web site (<http://www.randi.org>).

*David G. Hunt
High Wycombe, Bucks*

Editor's note: We apologise for type-setting errors in the last issue, particularly inconsistent use of hyphens and n-dashes.

The Skeptic is published quarterly. A year's subscription covers 4 issues. Please make cheques, postal orders (£ Sterling only), credit cards (MasterCard/Visa) payable to The Skeptic.

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