

it has completed four investigations into human rights. The investigation in Kashmir was the first independent assessment in the region. It was called for by a chairman of surgery who had been required to falsify figures for casualties. Because Amnesty International had been repeatedly refused entry, two members of the group flew in as tourists at some personal risk. On returning they were invited to give evidence before the parliamentary committee on human rights and their report was forwarded to the Prime Minister.² Physicians for Human Rights was the first human rights organisation to enter Kuwait City after its liberation. Evidence of violations that had taken place before and after the Iraqi withdrawal were recorded and relevant information was passed to the International Red Cross and the British foreign secretary before his meeting with the Emir.³ More recently the group has completed two studies in conjunction with the Dutch Johannes Wier Foundation: one in South Africa assessing progress towards the elimination of racial inequality in the provision of health care and the other in Yugoslavia examining the effect of the ethnic conflict on medical services and the conduct of doctors.⁴

Clearly, an independent and non-political human rights organisation that can rapidly deploy the requisite medical skill to where it is needed has a valuable part to play. The future

depends on the members' response to the challenges ahead, but it also depends on winning wider support from the medical profession. The more members there are the broader will be the range of skills on which the organisation may draw and the more effective and influential it will become. At present the organisation's activities are financed almost entirely from subscriptions. Membership is open to all doctors, medical students, and health care workers. Such is the human condition, it seems unlikely that the group will ever find itself out of a job, however large it grows.

Annual membership costs £20 a year (£10 for students). Inquiries to the Physicians for Human Rights (UK), C/o University Department of Forensic Medicine, Royal Infirmary, Dundee DD1 9ND.

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On lightning

Hair standing on end may be warning of an impending strike

The common cormorant or shag
Lays eggs inside a paper bag.
The reason you will see no doubt—
It is to keep the lightning out.
But what these unobservant birds
Have never noticed is that herds
Of wandering bears may come with buns
And steal the bags to hold the crumbs.

Anon

Being struck by lightning is a remote chance in England and Wales: about five people are killed in this way in an average year.¹ Doctors sometimes use the statistic to put other remote risks into perspective (deaths from rabies, for example, are far less common than deaths from lightning in Britain and even in countries such as the United States, where the disease is endemic). Such analogies, however, should be used carefully outside Europe. Lightning strikes are much more common in tropical countries. From 1965 to 1972 there were 430 deaths from lightning in Rhodesia (now Zimbabwe), which at that time had a population of less than four million.² Deaths on the road were only five times more frequent.

Thunderstorms become increasingly common as the air temperature rises, and they occur more often in mountainous country. Around the world at any moment there are close to 2000 thunderstorms in progress and lightning strikes the earth 6000 times a minute. The mortality from lightning is largely determined by geographical factors, but population density and behaviour both play a part. In the nineteenth century the annual death toll in England and Wales was 20, four times the present figure, and the same downward trend in deaths has been seen in other countries as a smaller proportion of adults have worked outdoors. Hills, open country, and open stretches of water are dangerous places in thunderstorms—and included in this category are golf courses, where deaths are not unusual.

Someone caught in a thunderstorm should take sensible

precautions. Get indoors if possible; inside a car is usually safe, too. Outdoors, throw away any metal or conductive object you may be holding—a golf club, a carbon fibre fishing rod, a gun—and don't use an umbrella. Don't shelter under a tree, and especially not an isolated tree. Oaks have a reputation for attracting lightning. Warning of an impending strike may be given by your hair standing on end. If this occurs crouch into a ball with your legs together.

Indoors, consider unplugging the television aerial (this may save you having to watch the set explode). Don't use the telephone—a survey in Australia found that 60 people a year were injured by lightning strikes being conducted along the wires to the handset; many were physically injured, and 10% lost consciousness.³

For every person killed by a lightning strike four or more are injured. Transient loss of consciousness is common, and some victims become temporarily blind or deaf. Burns may appear over the course of several hours.⁴ The most frequent cause of death is cardiac arrest, which may be due to ventricular fibrillation or asystole. Aggressive resuscitation measures are warranted, especially if a pulse is present or is restored, as the return of spontaneous respiration may be much delayed.

Lightning does strike in the same place twice—quite commonly. Tall buildings are hit repeatedly, often in a single thunderstorm. And Elsom describes a former park ranger who was struck by lightning in 1942, when he lost a toe nail; again in 1969, 1970, and 1972—when his hair was set alight; in 1973, when his regrown hair burnt again; and in 1976 and 1977.¹ Travellers to the tropics, beware.

Associate Editor, *BMJ*

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