

# The Role of Nurses in Travel Medicine from the Viewpoint of Travellers' Behaviour and Activities at the Destination

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## **Introduction**

Travel Medicine is primarily concerned with vaccinations and prophylaxis. However, there are a number of health problems that are not triggered by infectious agents but by travellers' behaviour and actions during the journey and at the destination. Lacking pills against imprudent behaviour, it is the purpose of comprehensive travel health education to alert to potentially harmful situations and suggest appropriate risk-minimising health behaviour. Health promotion and education are major roles within the professional scope of nurses. This places nurses at the forefront of travel health education and makes them indispensable in clinical travel health practice. A version of the following discussion was presented at the 8<sup>th</sup> APTHC in Nara in October 2010.

Focusing on travellers' behaviour is interesting and important as it has long been observed that people away from home and outside their usual social and environmental context often behave unexpectedly and inexplicably. Some travellers, due to lack of experience, are ill-equipped for travel and often lack the ability to judge unfamiliar situations correctly. Others seem utterly unburdened by reasoning when they embark on a trip. Yet others behave as if travel was their prerogative, and everything and everyone they encounter exists to serve their cause. This type of tourist displays egocentric tendencies and does not care much about consequences of his or her actions. Travellers' actions affect the well-being of two different groups of people. On the one hand, they impact on their own well-being; on the other hand, their behaviour also affects the physical and mental well-being of local people. This paper will first discuss behaviour that harms the tourists themselves and then progress to potential harm inflicted on the

local population. Afterwards, the important role of travel health nurses in relation to tourist behaviour is highlighted.

### **Tourist Behaviour – Harming Themselves**

Although there is always the risk of an accident (defined here as an unavoidable occurrence that could not have been prevented), many travel-related health problems occur due to reckless behaviour of the travellers themselves. The brevity of this paper does not allow for detailed descriptions of the individual risks and statistical evidence but such data are easily obtainable from the now extensive travel medicine literature.

#### *Well-known health risks*

The impact of tourist behaviour on their gastrointestinal health while travelling is well-documented with Travellers' Diarrhoea being on top of the reported travel-related ailments. Poor judgment in the choice of food and drink, and a lack of basic hygiene measures, most importantly hand-washing, are disappointing observations considering the wide-spread availability of travel health advice. Travel-related sexually transmitted infections are an occurrence noticed throughout history but this does not explain the still astonishingly low and/or inconsistent use of condoms, often facilitated by alcohol and drug use. In addition, alcohol and drugs often play a role in accidents as do unfamiliarity with local road rules or unexpected traffic hazards. Tourists can also come to harm through violence, either by misjudging a situation or by initiating it.

#### *Under-researched health risks*

To counter-balance the challenges of urbanised life, nature-based tourism, from ecotourism and adventure tourism to farm holidays, enjoys rapidly growing popularity. However, nature is not inherently harmless, benevolent or 'healthy'. Nature reacts 'naturally' and consequently to inappropriate behaviour. The link between tourism and the environment is usually concerned with the impact of tourism on the environment. For the purpose of this discussion, the impact of the environment on the traveller is of interest, and, especially, the health risks provoked by the tourists themselves. Environmental health hazards are extraordinarily wide-ranging and various methods of categorisation are possible. Here, a simplistic gathering of important hazards under a common theme is chosen as it may also be used for pre-travel health advice. The following discussion focuses on a brief description of potential 'natural' health risks with the tourist in mind who does not employ commonsense in risky situations, or who ignores any advice given.

*Physical* hazards include those connected to changes in barometric pressure, temperature, the sun and water. Travellers are exposed to changes in barometric pressure when they venture to high altitude during trekking or mountaineering expeditions. Ignoring advice on the preparation of such trips and on behaviour at high altitude, including the appropriate response to health problems, can prove fatal. The same applies to scuba diving, an activity which seems to gain popularity and, perhaps for this reason, is often not given the proper attention and respect it deserves. Hyperthermia and hypothermia are health problems due to the exposure to extreme changes in temperature. Inappropriate clothing, poor preparation or getting lost in hostile terrain are likely causes and, usually,

traveller-induced. The sun is for many tourists one of the most essential attributes of a successful holiday. Unfortunately, exposure to the sun can not only contribute to hyperthermia but to severe skin and eye damage. Finally, water - like the sun a core magnet for many tourists - poses major health hazards. Many activities rely on the immersion in water, such as swimming, snorkelling, diving or scuba-diving. Other sports require equipment, such as boards, jet skies, boats or rafts. Drownings and water sports accidents are not always unavoidable events but caused by the 'victims' themselves.

*Geological* formations, for example, volcanoes, geysers and hot mud springs, are major tourist attractions and, as can be expected, attract also dangerous tourist behaviour. The climbing of volcanoes, especially when active, appears fascinating to some, and foolish actions include walking on hot lava or attempting to touch it. Geysers, although restricted to a particular location, are still dangerous and hot water may spray onto tourists standing too close. Elsewhere, tourists have died by breaking through thin crusts above boiling waterholes after entering areas clearly marked as dangerous.

*Natural disasters*, such as earthquakes and tsunamis are largely unpredictable, but once they occurred have a magic attraction for some people who wish to inspect a disaster zone even if dangerous and asked to leave. Predictable events, such as hurricanes, cyclones or typhoons, allow tourists in threatened areas to leave on time. However, again, some people attempt to remain or refuse to be evacuated to experience the thrill of being in the centre of a disaster.

*Biological* hazards relate to animals and plants. Tourists have ample opportunities to come in contact with animals, especially when animals are the focus of a trip, e.g. on a wildlife safari. Although strict guidelines exist regarding the appropriate behaviour to ensure the travellers' safety, some people seem to forget that they are observing wild animals and try to approach large animals, such as lions, elephants or hippopotamuses, as a thrill or because of their 'love for animals'. In other scenarios, ill animals can either attack tourists or transmit diseases, with rabies the most worrying. A rabid deer will suddenly appear tame and affectionate, much to the delight of travellers who respond by patting it. Poisonous animals are another cause of illness or death in travellers. Ignorance may be one reason but often it is the thrill-seeking that leads people to picking up a snake or touching a shell they were warned not to touch. When discussing animals that are posing a risk to travellers' health, ectoparasites, such as lice or fleas, also need to be mentioned, and bedbugs (*Cimex lectularius*) seem to be enjoying a global recurrence at this point in time. Plants can also pose a threat to travellers. Eating unfamiliar fruit and berries may result in poisoning or at least gastrointestinal upsets. Some plants may be hazardous to touch, such as the Australian Stinging tree (*Dendrocnide moroides*) which causes excruciating local pain for many weeks. Jetlag and motion sickness are further biological hazards whose severity may depend on travellers' (im)prudent behaviour.

*Chemical* hazards relevant for travellers concern mainly the pollution of air, water and soil. Travellers should avoid spending prolonged time in areas with considerable smog, such as Santiago de Chile during winter, especially if they suffer from pre-existing respiratory ailments. Swimming in polluted water poses the risk of skin, eye and

gastrointestinal infections. Barefoot walking should be avoided when the ground seems polluted by solid or liquid substances or waste. Environmental travel health risks are still under-reported in the travel medicine literature in favour of drug treatments and vaccination schedules. More detail on such health hazards for travellers can be obtained from Bauer (2001, 2011).

### **Tourist Behaviour – Harming the Hosts**

The discussion now moves on to the second area, the impact of tourist behaviour on the local population living at the destination. Although this problem has been acknowledged for a decade or so, tourists' appropriate behaviour on location still seems excluded from current travel health advice. Tourists' behaviour has indirect and direct implications for local health. Again, ignorance may be a reason, but often is it tourists' arrogance and general carelessness or lack of consideration for others. Residents in industrialised countries are used to heterogeneity of people, cultures and their visible characteristics. Therefore, visitors may not create offense or inflict harm due to inappropriate behaviour. Also, many 'westerners' will have travelled and seen people doing things differently in different countries. Furthermore, they have the privilege of sheer unlimited information through television and the internet. In contrast, people in resource-poor rural and remote areas, who never had the opportunity to observe different customs, will compare tourist behaviour with what is acceptable in their own culture and, in the worse case, feel offended and insulted by what they see and hear. They are also exposed to a more immediate health problem that depends much on tourist behaviour: the direct

transmission of diseases. For this reason, it is important to include appropriate behaviour in any travel health advice.

### *Indirect health impacts*

Although tourism can have an economic benefit for destinations (and this is the prime reason why developing countries pursue this source of income), there are many aspects that may be harmful for locals in the long term. The economic gap between tourists and locals and its ramifications affect poor people in a variety of ways, from the emphasis of their own poverty compared to the wealth displayed by western tourists, and rising prices for land, goods and services, to more aggressive competition for the tourist dollar.

Apparently innocent transactions, such as tipping and bargaining, all can increase people's poverty. Environmental health impacts are perhaps more obvious, especially when tourists and tourism developments destroy the environment through pollution, deforestation, and the overuse of non-renewable resources. Even the feeding of wild animals, such as dingos or bears, by tourists can pose a risk to health and lives of local people when animals have lost their easy food-supply because tourists have moved on, and the wildlife turns on local people instead. Socio-cultural impacts of tourism have been discussed since the 1980s but their implications on local health, especially also mental health, have rarely been examined. Changes in social and cultural behaviour triggered by exposure to tourism may have serious affects on local people as does the commercialisation of sacred rituals or the production of cultural events for tourism purposes. The marketing of funeral proceedings in Bali as a tourist attraction may serve as just one example. Tourists' actual behaviour on location, including their clothing,



gestures, postures and communication styles may be perceived as highly offensive by people living at the destinations. The commercialisation of intellectual property is not only seen as a socio-cultural but a political and legal concern, an area that entered the academic discussions only more recently. The political vulnerability of marginalised people (especially those in rural and remote areas) makes them a prime target for exploitation through tourism developments, and tourists indirectly – and one would hope inadvertently - contribute to the problem. Similarly, the right of indigenous peoples has often been curtailed in relation to tourism projects, many times ending in their removal from their ancestral lands.

#### *Direct health impacts*

More immediate health impacts can be explained in the direct transmission of disease, such as sexually transmitted, gastrointestinal or respiratory infections and the spread of vector-borne diseases, where the transmission can be explained by inconsiderate tourist behaviour. Accidents caused by tourists not only harm tourists, as pointed out earlier in this paper, but also members of the local population. Carelessness, unfamiliarity with road conditions or traffic rules, and the operating of vehicles (cars, boats, jet skis and so on) under the influence of alcohol and/or drugs have the same consequences as in the countries where the travellers come from. Workplace health and safety issues and the working conditions of local tourism and hospitality workers have come under scrutiny. Especially the fate of trekking porters, and high altitude porters has triggered some interest and research. The risk to health and life of local people rescuing tourists who got into dangerous situations, especially when warned of the dangers, has not received the

appropriate appreciation yet. A paper by Bauer (2008) provides more details on the various health impacts of tourists/tourism on local people.

### **The Role of Nurses**

Travel health professionals are slowly acknowledging that modern travel medicine does not only cater for the health of travellers but also for the health of the visited people. This is of particular importance in resource-poor countries which have become increasingly popular tourism destinations and whose people are often very vulnerable to impacts from outside.

Nurses in travel medicine traditionally provide the majority of high quality pre and post travel care. Pre travel care includes general health education, specific travel health advice and the administration and - in some countries - the prescription of vaccinations and prophylaxes. However, protecting the hosts' health is also part of the nurses' professional responsibility. Although local nurses at destinations are charged with the health care of their own people, travel health nurses in the countries from where the tourists originate are responsible to educate and prepare travellers to avoid harm to the people they visit. In other words, travel health occurs along a two-way street. This means, for example, that Japanese travel health nurses need to not only prepare Japanese travellers leaving for overseas but ensure the health of overseas visitors to Japan. Another example: Indonesian nurses prepare Indonesian travellers to the United Kingdom but also cooperate with UK nurses so that they, in turn, can prepare UK travellers to Indonesia not only to safeguard

their own health but to minimise negative impacts on the local population. Such comprehensive health care is only possible when nurses from around the world cooperate in areas such as information exchange, design of travel health policies/strategies, and applied nursing research, and provide a seamless global health care for visitors and the visited alike. The International Society of Travel Medicine (ISTM) and its Professional Group for Nurses is the organisation most able to fulfil this bridging role.

Similar to the recent renewal of the Primary Health Care Movement as the future global health care model which sees nurses in the leading role, nurses are the un-sung leaders in travel medicine despite the fact that many of them did not yet have the opportunity to receive the necessary education in this specialty. Modern travel medicine acknowledges the global nature of tourism and its ramifications on the health of travellers and locals alike. Nurses are at the forefront of this exciting movement and the ones who need to be best-prepared for this challenge.

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