WHAT IS SCHISTOSOMIASIS?
- Schistosomiasis, also known as bilharzia, is a parasitic disease contracted from the larvae of freshwater snails. It is most common in African countries.

CAUSES
- Schistosoma infections are contracted through contact with contaminated fresh water. The parasite in its infective stages is called a cercaria larvae.
- On contact with humans, the parasite burrows into the skin, matures into another larval stage (schistosomula), then migrates to the lungs and liver (where it matures into the adult form).
- The adult worm then migrates to its preferred anatomic area, depending on which species is involved (there are five species: Schistosoma mansoni, S. haematobium, S. japonicum, S. mekongi and S. intercalatum). Likely areas include bladder, rectum, intestines, liver, portal venous system, spleen, and lungs.
- Fresh water becomes contaminated by schistosoma eggs when infected people urinate or defecate in the water.

SYMPTOMS
- Initial infection is often asymptomatic but itching can occur at the site of entry hours after contact with infected water.
- When the worms start to release the eggs two to four weeks later, the person can become seriously ill with Katayama fever, involving chills, diarrhoea, cough, and a rash.
- Eggs travel to the liver or pass into the intestine or bladder and long-standing disease can lead to problems with the bladder, kidneys, bowel, liver or lungs, where small tumours can form around the eggs.
- Symptoms of schistosomiasis are caused by the body’s reaction to the eggs produced by worms, not by the worms themselves.
- Inflammation of the colon with bloody diarrhoea.
- Seizures.
- Rarely, eggs are found in the brain or spinal cord, causing obstructions and resulting in seizures, paralysis or spinal cord inflammation.
- Recurrent blood infections can be an issue as bacteria can enter the bloodstream from the colon if it is irritated.

DIAGNOSIS
- Patients provide samples to see if they have schistosome eggs in their urine or stool.
- A biopsy of tissue suspected of being infected can be taken.
- There is also a blood test available. For accurate results, patients must wait six to eight weeks after the last exposure to contaminated water before the blood sample is taken.

COMPLICATIONS OF SCHISTOSOMIASIS
- Pulmonary hypertension.
- Heart failure (right-sided).
- Renal failure.
- Obstruction of the kidneys and bladder.
- Cancer of the bladder.
- Liver damage, with an enlarged spleen.
- Recurrent blood infections can be an issue as bacteria can enter the bloodstream from the colon if it is irritated.

TREATMENT
- Praziquantel is the drug of choice. However, it will only treat mature worms (they can take 40 days to reach maturity), so taking the drug immediately after swimming is unlikely to be effective.

WHERE CAN IT BE CONTRACTED?
- Freshwater lakes and rivers in parts of Africa, Asia, South America, and the Middle East.
- It is most widespread in Africa.

RECOMMENDATIONS FOR TRAVELLERS
- Avoid freshwater swimming and paddling in endemic areas.
- Swim or paddle only in swimming pools or seawater.
- Drink bottled water.
- Travellers should also contact their health care provider if they have been to an area where the disease is known to be a problem, have been exposed to contaminated or suspect water, or display symptoms of schistosomiasis.

REFERENCES
- NHS Scotland (2005) Schistosomiasis (Bilharzia). Available at: www.fitfortravel.scot.nhs.uk