

BELGIAN CONSENSUS MEETING ON TRAVEL MEDICINE

19-06-2009

Final version 21/07/2009

The consensus meeting was chaired by A. Van Gompel.

Secretary of the meeting was W. Peetermans and P. De Munter.

The hand-out (in Dutch and French) with highlighted proposals for changes was distributed during the meeting. A PowerPoint presentation was prepared by A. Van Gompel. The discussions and recommendations of the meeting will be included into this PowerPoint presentation. The complete presentation will be sent to all participants for additional remarks and approval. This document will serve as the basis for the approval by the “Superior Health Council”. The final presentation will also be available on the website of the Institute for Tropical Medicine Antwerp (www.itg.be “informatie voor de deskundige / Informations destinées aux experts”)

The sources for the update of the recommendations were:

- International Travel and Health (WHO: edition 2009, available on the website)
- Health Information for International Travel (CDC: edition 2010, available as book, not yet on the website),
- international literature and ISTM congress, discussion forum ISTM
- E-edition of Medasso.

It is stressed that always the latest edition of these documents has to be consulted and not earlier editions.

The incidence rate per month of health problems during a stay in developing countries was updated by Steffen in 2008. This incidence tree will be published yearly in the Journal of Travel Medicine, and has been reproduced in the CDC 2010 booklet. The incidence of hepatitis A and hepatitis B decreased, while the incidence of influenza and dengue became more pronounced.

Yellow fever

1. Recommendations

- The advice for yellow fever vaccination hasn't changed compared to the 2008 recommendations. WHO 2008: “Yellow fever vaccination is in general recommended for all travelers to areas with risk of yellow fever transmission and wherever mandatory (2009 p.137). An individual risk assessment based on duration of travel, activities during travel, risk of exposure, medical history, age and previous immunization status is indicated (2009 p.191)”.

- Future travel plans have to be considered, especially in people approaching the age of 60 years and patients who might be transplanted or receive immunosuppressive therapy in the future (EG inflammatory bowel disease, rheumatoid arthritis, ...).
- Thymectomy is considered as a contraindication irrespective of the etiology of the thymectomy (thymoma; sternotomy; irradiation, ...). There is no test to evaluate whether there is still residual activity of the thymus.
- If a waiver has to be given to a patient because of a medical contraindication, it is recommended to mention the time period for which this contraindication is valid. An explanatory letter can be given to the patient in order to explain the medical reason for the yellow fever vaccination waiver. Mosquito prevention in day time is the main prophylactic measure and must be clearly explained to the patient.

2. Geography of yellow fever endemic areas

- New maps have become available by WHO and CDC. The yellow fever endemic area in Brazil, Argentina and Paraguay has expanded. The yellow fever endemic area is approaching the coastline in Brazil. The largest cities such as Sao Paulo, Rio, Recife and Salvador are still free but the countryside in the state of Sao Paulo has become yellow fever area.
- In the future WHO and CDC will mention four categories of yellow fever risk : endemic zone; transitional zone; potential risk zone and yellow fever free zone. Vaccination is highly recommended for endemic and transitional zone and can be considered for potential risk zone since progression of yellow fever endemicity can be fast.
- Health authorities are vigilant because the vector (*Aedes mosquito*) for dengue is also the vector for yellow fever and dengue has evolved considerably in south and middle America. This implies a permanent risk for further expansion of yellow fever areas.

3. Immunosuppressive treatment

- Yellow fever is a live attenuated vaccine. Therefore patients under immunosuppressive treatment have a contraindication for this vaccine.
- It is generally recommended to stop immunosuppressives for three months before vaccination (corticosteroids 1 month) and to restart immunosuppressive treatment three to four weeks following the vaccination.
- The contraindication level for corticosteroids remains above 20mg prednisolon for two weeks. Prednisolon < 10mg is no contraindication. Prednisolon between 10 and 20mg requires expert advice, taking into account underlying disease and its immunosuppressive character as well as current and cumulative dose.

- The interval between stop of immunosuppressives and administration of the vaccine can be longer than three months for infliximab, rituximab and leflunomide. A safety interval of three months is also used for methotrexate and azathioprine.
- The issue of immunosuppressive treatment will be discussed in depth during the seminar in November 2009. In case of revaccination there is a small risk of viremia too. Viremia may be higher and prolonged in case of immunosuppressive treatment. So revaccination cannot be given under immunosuppressives as is the case for the primo vaccination.

Cholera

The cholera vaccine is not recommended for travelers and is reserved for high risk situations.

Vaccination scheme 2009 Superior Health Council

- The new recommendations for recovery of missed vaccinations will be published soon on the website of the Superior Health Council.
 - Concerning tetanus-diphtheria the second dose can be given after a minimum of 6 months following the first dose.
 - Concerning measles-mumps-rubella the second dose can be given after a minimum of four weeks following the first dose. Every dose count irrespective the time interval longer than four weeks.
 - Hepatitis B booster can be given from 16 weeks onwards after the first dose (scheme: day 0, day 30 and week 16). This scheme can be considered if there is enough time to replace the other rapid scheme (day 0, day 7, day 21 and booster after one year) that requires an additional dose.
- If indicated Boostrix can be administered as soon as one month after the previous Td vaccine. Boostrix-polio is commercially available in Luxembourg. It has an EMEA registration but is not commercialized in Belgium because only limited number of people may be considered.

Polio

- WHO published a new map. Polio is still increasing in Africa and remains active on the Indian subcontinent.
- One lifetime booster as an adult (from 16 years on) provides lifetime protection. This is clearly so for the inactivated polio vaccine and likely so for the oral polio vaccine booster.
- South-America is polio free but travel to South-America can be used to administer the polio booster as a lifetime investment.

Hepatitis A

The recommendation of previous years is confirmed.

- Children visiting friends and relatives in endemic countries are a specific risk group that is recognized as a source of small epidemics after return to Belgium.
- One dose of Twinrix is not enough to provide protection for hepatitis A: if time is lacking to give the second dose of Twinrix then Havix has to be given and hepatitis B vaccination started separately.
- The junior formulation can be used up to the age of 15 years (in the US even up to the age of 18 years), irrespective of the body weight of the patient.
- The serology for hepatitis A has become highly sensitive but is only considered to check protection in immunodeficient patients.

Hepatitis B

- Superior Health Council recommends a onetime test for antibodies following the booster dose of the primo vaccination. If protective antibody levels are detected there is lifelong protection and this can be declared in the yellow booklet.
- The information of protective antibody levels is lacking in most patients that were vaccinated during previous years. If no antibodies are present one dose is given and serology is tested after one month. An antibody response proves immune memory and equals protection. If no antibody can be detected a full revaccination scheme can be completed.

Typhoid fever

- The oral attenuated live vaccine Vivotif is again available on the Belgian market. There is some cross protection for paratyfus B and A but the clinical relevance is limited.
The registration insert must be checked (for instance minimum age 5 year). Vivotif must be taken as an intact capsule one hour before meals. Simultaneous use of antibiotics and antimalarials interferes with immunogenicity of the oral vaccine.
- There are no new data on conjugated thypoid vaccine.

Meningococcal vaccine

WHO has a new map indicating the meningococcal risk zone and the meningitis belt. The website of Promedmail must be checked for local epidemics and extensions of the meningitis zone. No news about the conjugated quadrivalent vaccine.

Japanese encephalitis

- The distribution of the Green Cross JE vaccine has stopped.

- A new JE vaccine, derived from cell cultures, has become available. IXIARO vaccine is registered by EMEA. Based on the current information there is no problem of allergy or late side effects. This implies that the second dose can be given without considering the ten day interval between administration of the vaccine and date of travel. The vaccination scheme is day 0 and day 28. Data for children up to 17 years of age are still lacking. Based on the current knowledge and experience the administration of half dose of the adult formulation can be recommended. The scheme for booster doses has not been determined yet. The cost of the two dose scheme with IXIARO is similar to the three dose scheme of the previous vaccines.
- The guideline (4 weeks travel in rural area in endemic zone) has not changed.

Tick-borne encephalitis

- The most recent map can be consulted on the website of the Institute for Tropical Medicine.
- DEET can be used for skin repellent. Permethrine spray has become easily available and is recommended for clothing.
- Ticks are present in Austria up to 1500 m.

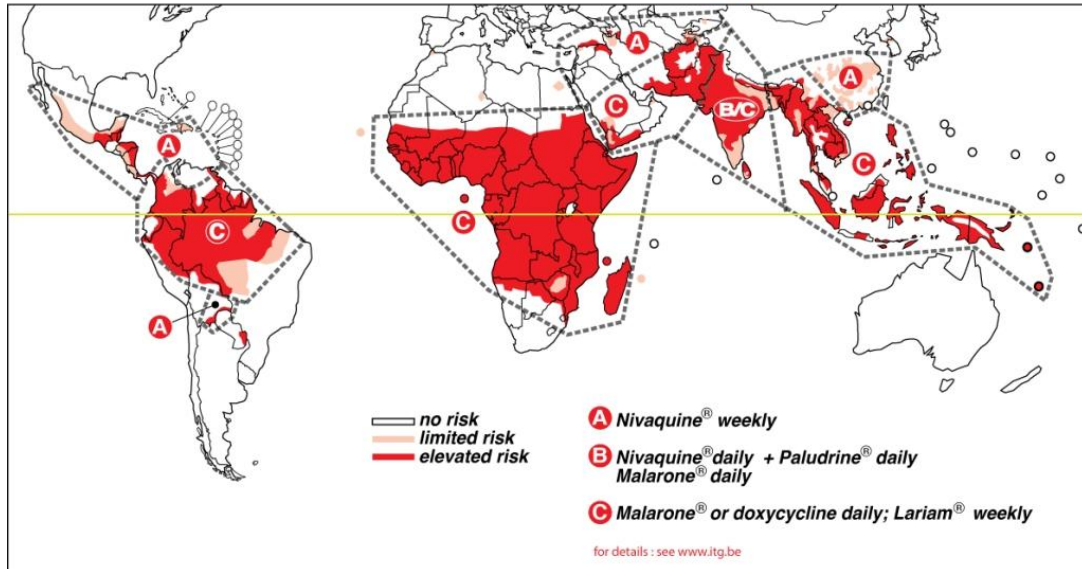
Rabies

- The incidence of exposure to animal bites with rabies risk is considered 450 / 100.000 per month.
- The availability of the vaccine for preventive vaccination of travelers and expatriates via Pasteur remains unpredictable. Individual travelers can decide to contact Pasteur in Brussels to ask whether they can come to purchase the vaccine. All centers can offer Rabipur for rabies vaccination. Therapeutic interventions remain the legal responsibility of the Pasteur institute (new name: Directie besmettelijke en overdraagbare ziekten / la Direction des Maladies Infectieuses et Transmissibles).
- It is likely that after the primo vaccination with three doses (day 0, day 7 – 14, day 28) and a booster injection after one year, the patient remains boostable even if regular boosters were not administered. WHO-ITH 2009 p.127: “Periodic booster injections are therefore not recommended for general travelers”.
- Post-exposure prophylaxis always remains indicated because pre-exposure vaccination must be considered as partly protective.

Tuberculosis - BCG

- Children up to five years of age who travel every year for one month or longer to a country with a medium or high TB rate can be considered for BCG vaccination. BCG must be given more than 8 weeks before date of travel in order to take care of purulent complications.
- The vaccine is no longer distributed by VRGT-FARES.

Malaria 2009-2010 (source WHO 2008)



Malaria

- The malaria map 2009 is nearly identical to the map of previous years. The map of the Institute for Tropical Medicine & Belgian Scientific Study Group on Travel Medicine still uses the A-B-C zones. Lesser risk in Vietnam. More risk in Haiti. No zone B anymore in the Pacific.
- Savarine-system (Nivaquine + Paludrine in one tablet) can no longer be used in Africa, except Madagascar (according to the French guidelines), because of high resistance rates to both components of Savarine.
- Deet and Picaridine are available as repellent. Efficacy of both repellents remains good even if a sun blocker is used simultaneously.
- There is no medical reason to limit the use of Malarone to one month or the use of Lariam to three months. If well tolerated, these drugs can be used for a prolonged period of time.
- Doxycycline remains a valid alternative for malaria prophylaxis in zone C. The risk for photosensitivity is estimated to be between 1 to 10 %. This figure may be higher if no sun protection is used.
- Riamet is not promoted as standby treatment because of the necessity of a previous ECG electrocardiogram.

Geographical issues

- A map of Lariam resistance is available on the website of CDC and WHO.
- Detailed maps for Birma, Vietnam, Cambodia and Thailand can be used to inform the patient.
- Malaria has become endemic in Haiti throughout the year and in the whole country except Port-au-Prince.
- Nivaquine, Paludrine and Malarone remain active.
- For the Dominican Republic, Kingston, Jamaica and Bahamas prophylaxis is not recommended but fever after return must include malaria in the differential diagnosis.
- In India high and low risk areas have been determined. India remains B-C zone. For backpackers in less favorable travel conditions prophylaxis is recommended.

Traveler's diarrhea

The self treatment is a one-day treatment except if persistent or severe diarrhea. Self treatment can only be recommended during travel and not after return. The expiration date of the antibiotics must be checked before leaving and expired boxes must be brought to the pharmacy for removal. Azithromycin is confirmed as first choice in Asia because of increasing quinolone resistance.

Varia

Dengue

Epidemics have been reported in Yemen and Saudi-Arabia.

Insect repellent during the day is recommended.

There are some scientific arguments that Africans may be resistant to severe dengue.

Chikungunya

Epidemics are ongoing in India and other parts of Asia.

The epidemic in Mauritius is no longer active.

There may be a risk in Northern Australia.

Schistosomiasis

Check the WHO map for schistosoma which is the real standard; some differences exist with the schistosoma map in CDC book 2010 (eg Brazil).

Influenza

Patients and health care professionals are referred to www.influenza.be.

Antiviral drug use is limited to symptomatic patients.

The context of preventive use of this medicine must be discussed with the influenza commissioner M. Van Ranst.

Deep Venous Thrombosis

- All kind of travel, not only airplane, enhances the risk for DVT. The risk further increases with other factors such as obesitas and hormonal contraceptives. In combination with a genetic predisposition, the risk increases strongly, even 20 to 50 times.
- Prevention relays on fluid intake and muscle activity. Elastic stockings can be considered. There is no indication for aspirin use. If high risk low molecular weight heparin can be used.
- This topic will be presented at the next seminar too.

National Travel Seminar 2009

The 2009 seminar on travel medicine is entitled :

“Travel medicine: risk prevention and assessment”.

This seminar will be held on November 19, 2009 in the Sodehotel Brussels. The main topics are :

- deep vein thrombosis,
- sexually transmitted diseases,
- vaccination in the immunocompromised traveler,
- vaccination for Mekka pilgrims,
- vaccination and allergy.

Similar to previous seminars there also will be a report of recent epidemics and flashes from the ISTM congress.

The book “gezond op reis” written in Dutch, A. Van Gompel, was presented to the meeting.