



Military Hospital Queen Astrid  
Bruynstraat 1, Rue de Bruyn  
1120 Brussel-Bruxelles

<http://www.hopitalmilitaire.be/index.php?lang=fr&Itemid=474>

11th National Seminar on Travel Medicine  
Thursday 19th November 2015

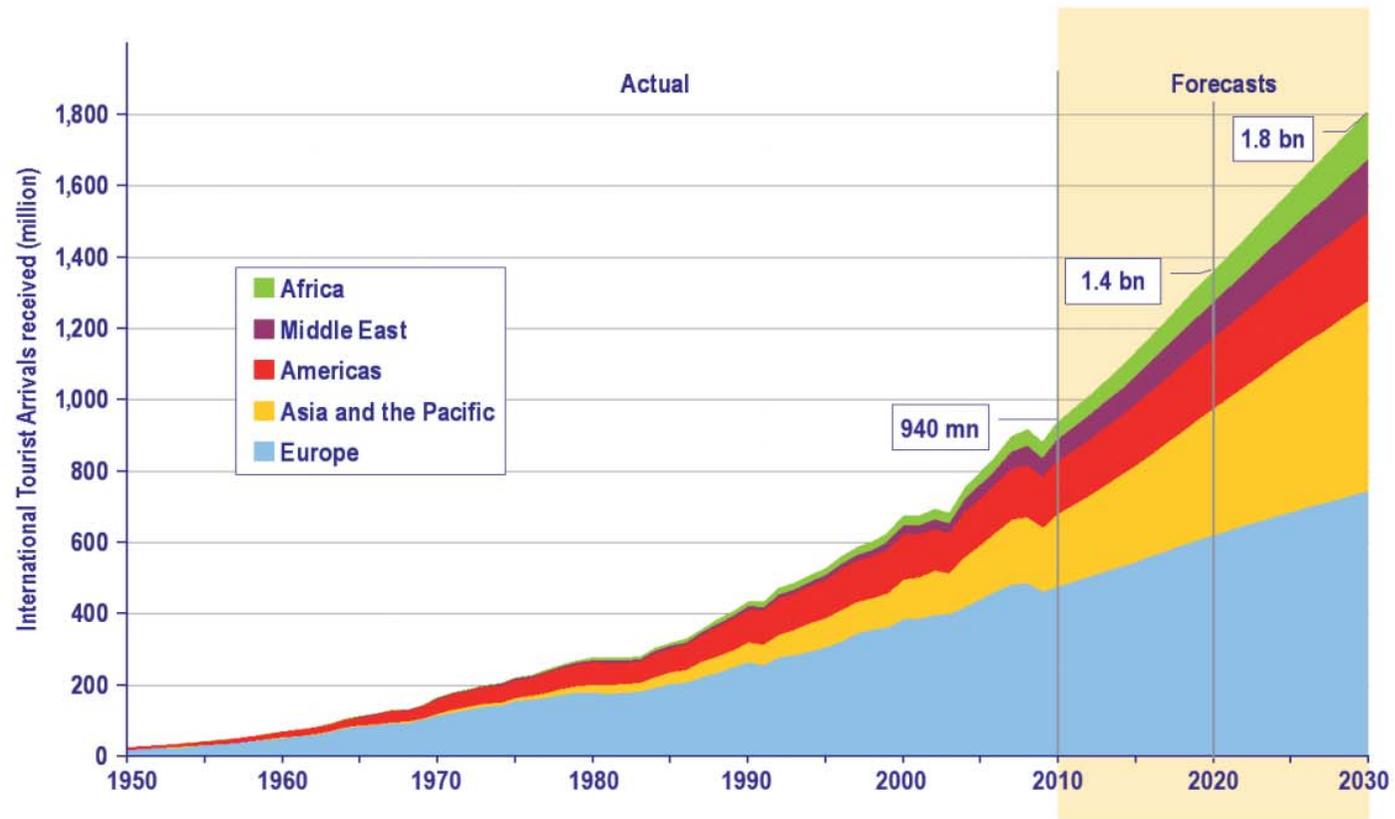
## TRAVEL MEDICINE SEMINAR: 20 YEARS LATER

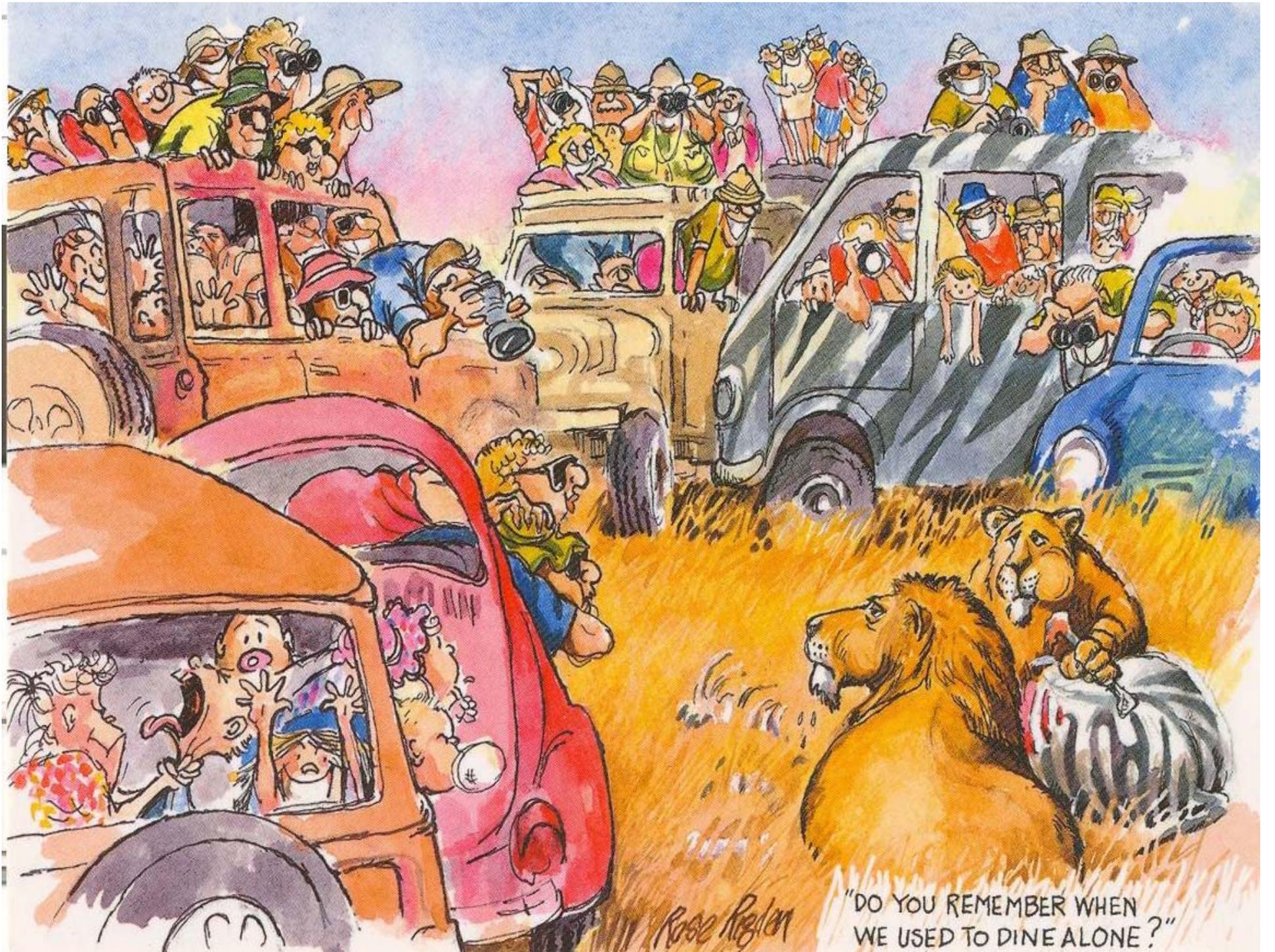
Chairmen: Fons Van Gompel – Yves Van Laethem

**What did change (drastically) in the  
last 20 years in travel medicine?**

Fons Van Gompel (ITG) &  
Yves Van Laethem (CHU. St- Pierre)

## UNWTO Tourism Towards 2030: Actual trend and forecast 1950-2030





"DO YOU REMEMBER WHEN  
WE USED TO DINE ALONE?"



# First National Seminar on Travel Medecine

## PREVENTION OF INFECTIOUS DISEASES IN TRAVELERS

Thursday 16 November 1995

Auditorium of the  
Military Hospital Queen Astrid  
Neder-over-Heembeek  
BELGIUM

### PROGRAM

13.30	Registration	
14.00	Prophylaxis of malaria. Synopsis for practice.	Dr. A. Van Gompel (ITG Antwerp)
14.45	How to disinfect drinking water	Dr. Y. Van Laethem (ULB)
15.00	Case studies	Dr. W. Peetermans (KUL) Dr. Y. Van Laethem (ULB)
15.45	Coffee break and visit to the exposition	
16.15	Vaccine preventable diseases and travel	Prof. R. Steffen (University of Zürich)
17.15	Hot News	Dr. R. Snacken (IHE)
17.30	European tick-born encephalitis	Dr. R. Wouters (Belgian Army)
18.00	The end	

Wetenschappelijke Studiegroep Reisgeneeskunde/Groupe d'Etude  
Scientifique de la Médecine de Voyage :

Dr. A. Van Gompel (ITG)  
Dr. R. Snacken (IHE)  
Dr. F. Jacobs (Hôpital Erasme, ULB)  
Dr. W. Peetermans (K.U. Leuven)  
Dr. Y. Van Laethem (Hôp. St. Pierre, ULB)  
Dr. Lt. Kol. R. Wouters (Medical Service Belgian Army)

# VACCINE PREVENTABLE DISEASES AND TRAVEL

Robert Steffen, MD

Institute of Social and Preventive Medicine  
of the University  
Zurich, Switz

**Table 1:  
Rationale for immunization of travelers**

Infection	Inci- dence	Impact	Total	Immunization	
				YES	NO
Hepatitis A	+++	++	+++++	<div style="border: 1px solid black; padding: 5px;"> <div style="border-left: 1px solid black; border-right: 1px solid black; padding: 2px;">The overcautious, unconcerned about AE</div> <div style="border-left: 1px solid black; border-right: 1px solid black; padding: 2px;">Rational</div> <div style="border-left: 1px solid black; border-right: 1px solid black; padding: 2px;">Irrational</div> <div style="border-left: 1px dashed black; border-right: 1px dashed black; padding: 2px;">The hazardous, but cost conscious</div> </div>	
Hepatitis B	++	+++	+++++		
Rabies	++	+(++)	++++		
Poliomyelitis	(+)	+++	+++(+)		
<i>Yellow fever</i>	(+)	+++	+++(+)		
Typhoid fever	++	+	+++		
Influenza	++(+)?	(+)	+++		
Diphtheria	(+)	++	++(+)		
Tetanus	(+)	++	++(+)		
Meningo. disease	(+)	++	++(+)		
Jap. Enceph'itis	(+)	++	++(+)		
Cholera	+	+	++		
Measles	(+)	+	+(+)		

Rate per 100'000: +++: >100, ++: 1-99, +: 0.1-0.9, (+): <0.1

Impact:

+++ high case fatality rate, serious residuals

++ ≥2% case fatality rate or incapacitation >4 weeks

+ low case fatality rate, brief incapacitation

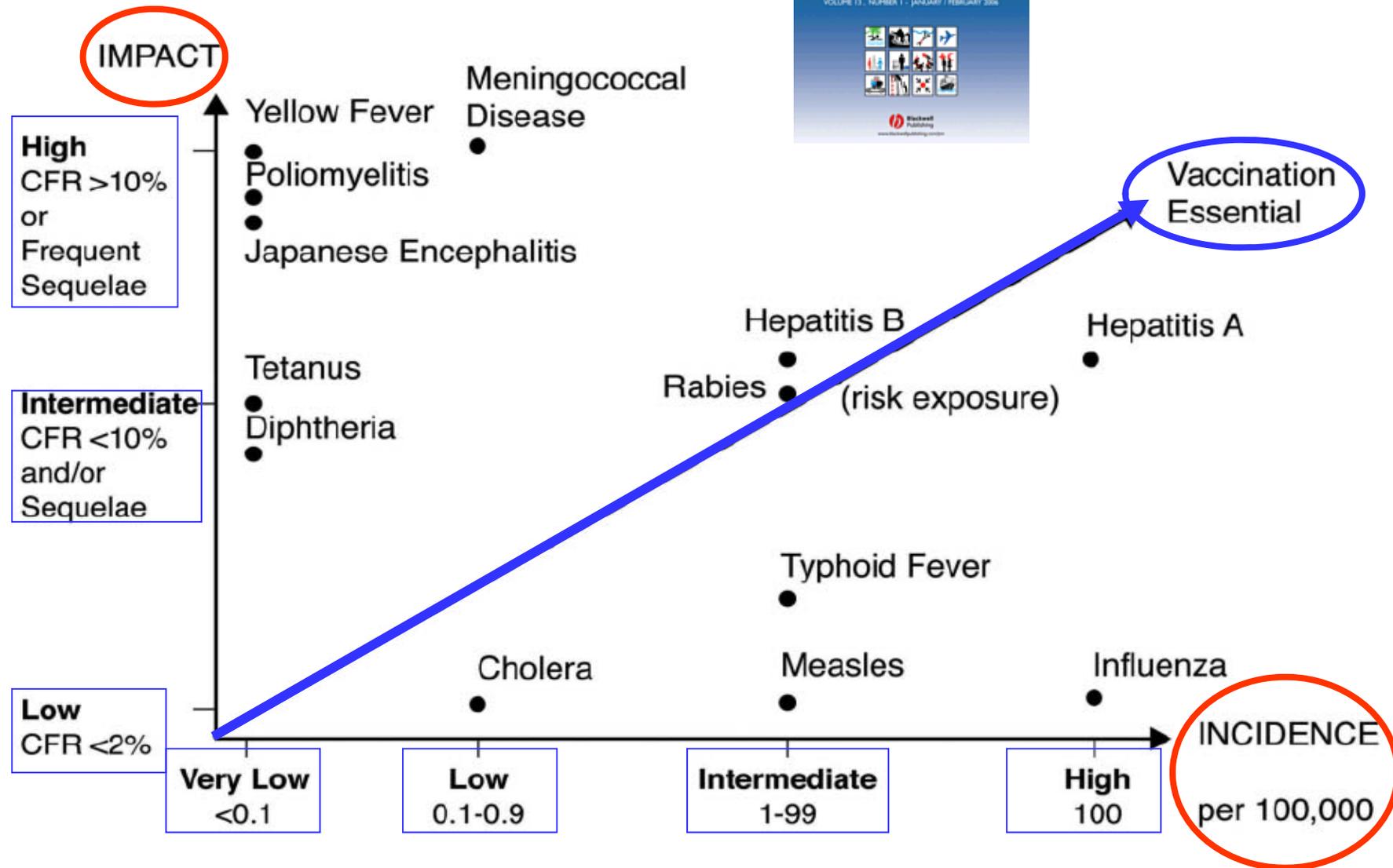
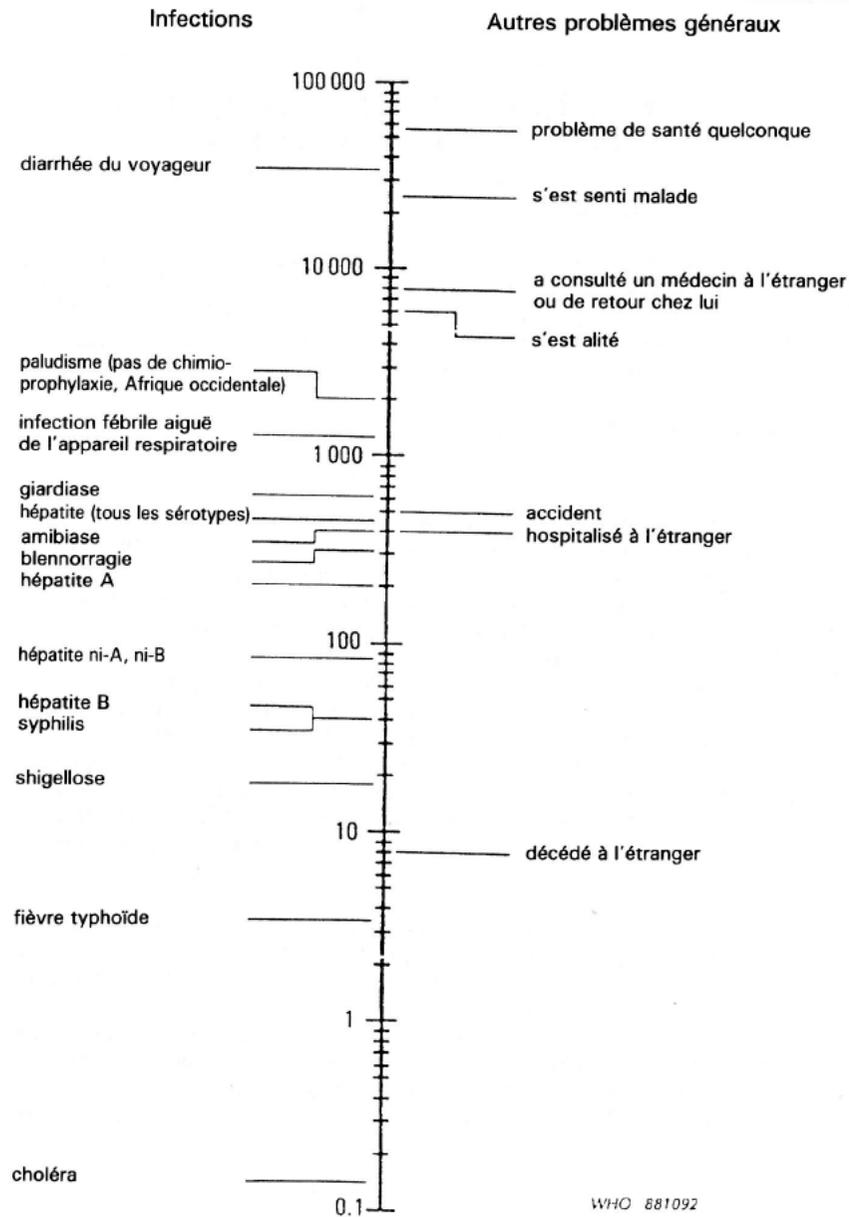


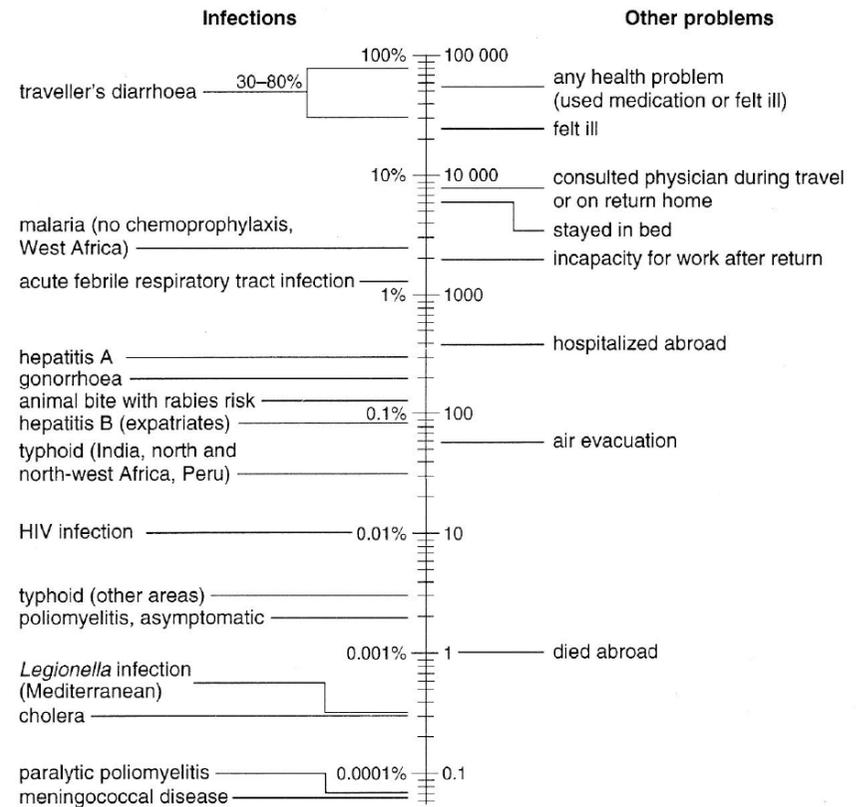
Figure 3 Impact and incidence of vaccine-preventable diseases in travelers to developing countries. CFR = case-fatality rate.

Fig. 1. Estimation du taux mensuel d'incidence des problèmes de santé pour 100 000 voyageurs en zones tropicales



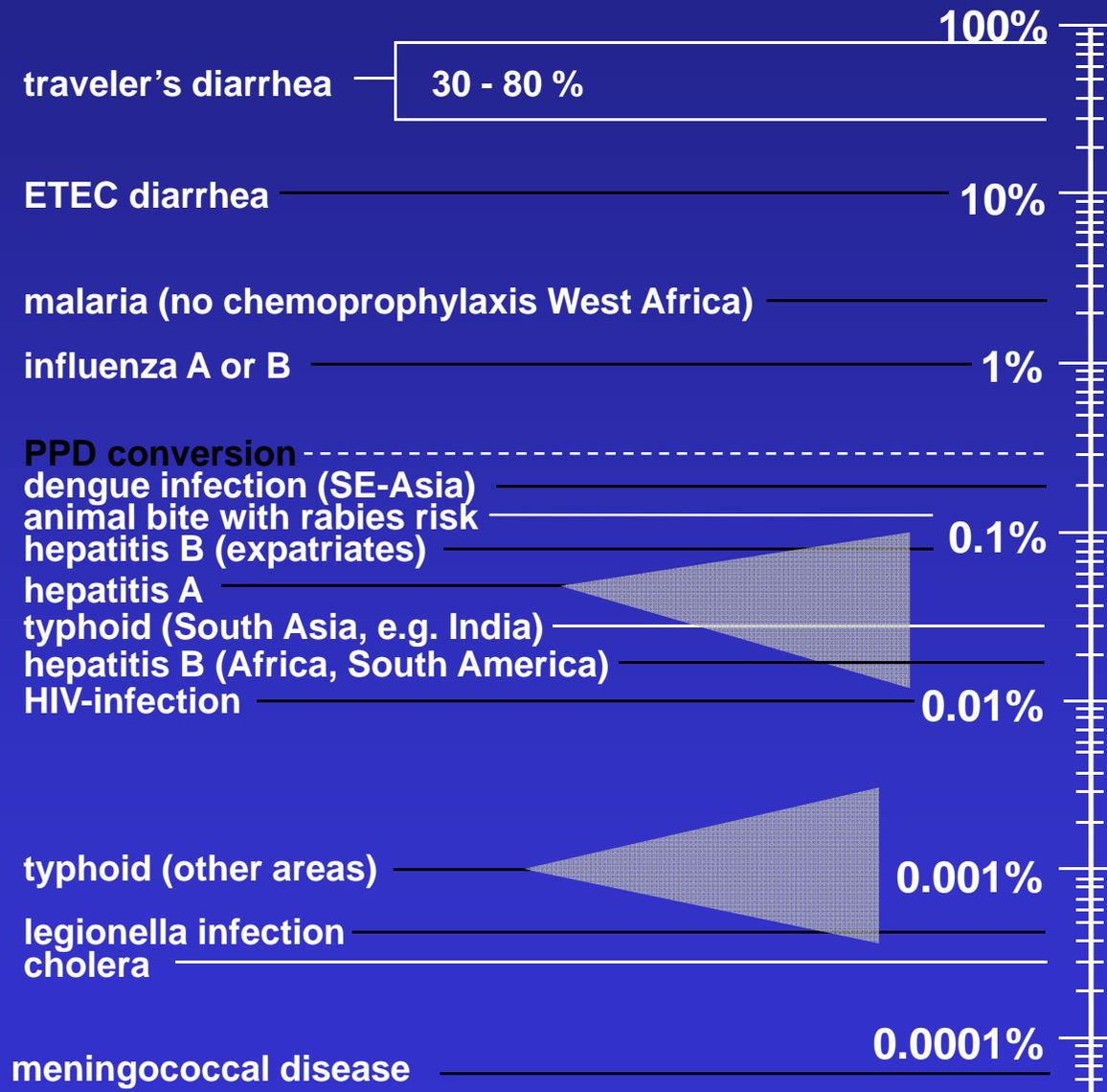
D'après: Steffen, R., *Proceedings of the Conference on International Travel Medicine*, Zurich, 1988. Berlin (Ouest), Springer-Verlag 1988.

Figure 1. Estimated monthly incidence of health problems per 100 000 travellers to developing countries

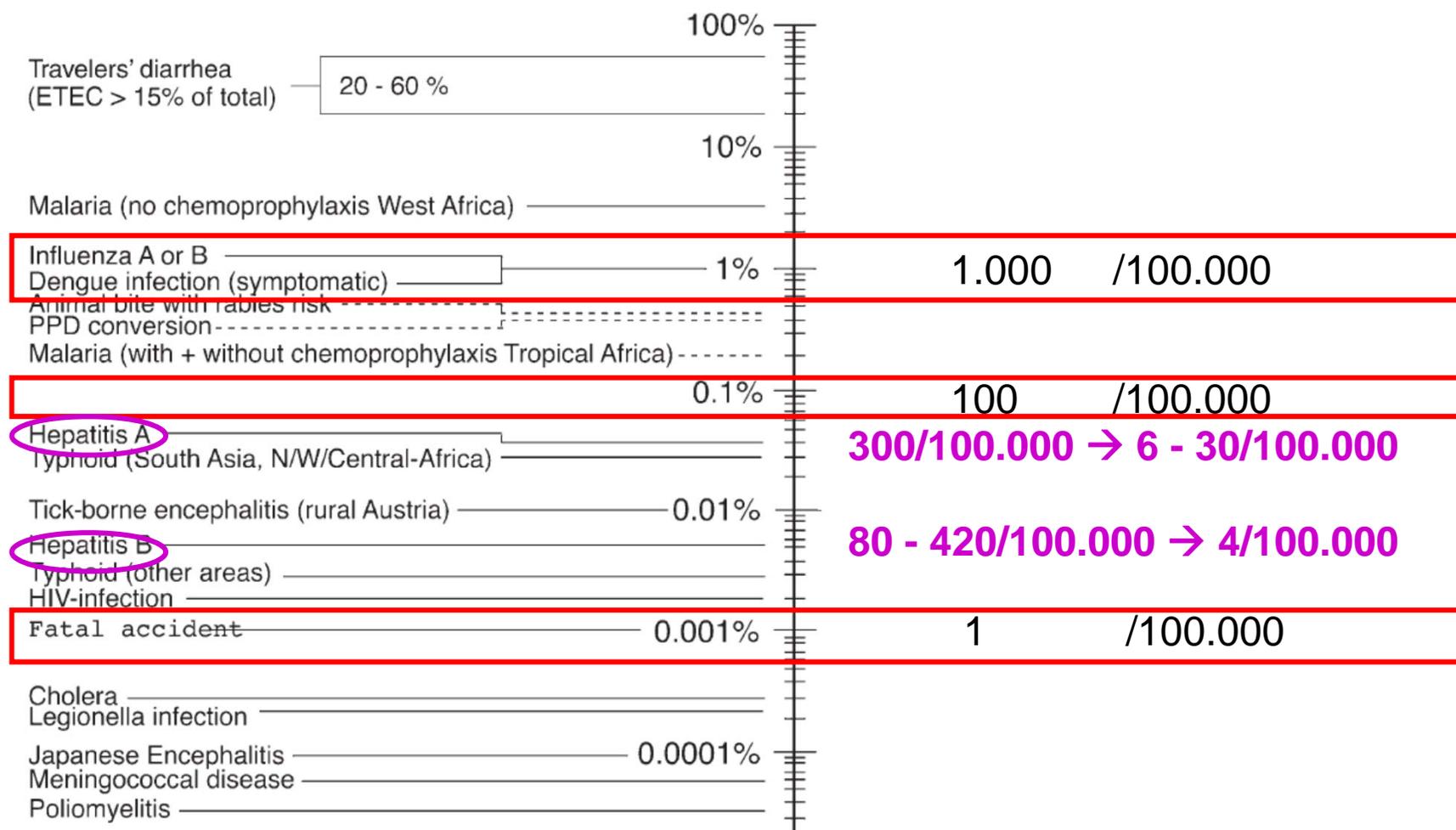


Adapted from: Steffen R, Lobel HO. Travel medicine. In: Cook GC, ed., *Manson's tropical diseases*, 20th ed. London, WB Saunders, 1996. Used by permission of the publisher.

# Incidence rate / month of health problems during a stay in developing countries – 2005



# New version Steffen tree– JTM 08



**Figure 1** Incidence rate per month of health problems during a stay in developing countries—2008.




  
 Wetenschappelijk Instituut voor Volksgezondheid
   
 Wetenschappelijke Evaluatie-Beleidsstudie
   
 Group of Study Scientific and Technical Aspects
   
*with Juan Escobar*
  
**EDITION 2004-2005**
  
**CONSENSUSVERGADERING 11/07/2004**
  
 Uitleg in samenvatting van DE NIEDE OERBESCHERMING - BEVEILIGINGEN
   
 Verspreid met: Dr. A. Van Gorpel, ITC
   
 Dr. A. Van Gorpel (2002), Dr. S. De Maesseneer (2002), Dr. P. Jacobs (2002), Dr. S. De Maesseneer (2002), Dr. J. Van Landuyt (2002), Dr. P. Jacobs (2002), Dr. S. De Maesseneer (2002), Dr. J. Van Landuyt (2002), Dr. P. Jacobs (2002)


  
 Wetenschappelijk Instituut voor Volksgezondheid
   
 Wetenschappelijke Evaluatie-Beleidsstudie
   
 Group of Study Scientific and Technical Aspects
   
**EDITION 2000-2001**
  
**REUNION DE CONSENSUS 16/5/2000**
  
 Verspreid juli 2004
   
 Edit. resp. A. Van Gorpel, ITC
   
 Dr. A. Van Gorpel (2000), Dr. S. De Maesseneer (2000), Dr. P. Jacobs (2000), Dr. S. De Maesseneer (2000), Dr. J. Van Landuyt (2000), Dr. P. Jacobs (2000), Dr. S. De Maesseneer (2000), Dr. J. Van Landuyt (2000), Dr. P. Jacobs (2000)

CONSENSUS WERK

**EDITION 2004-2005**
  
**REUNION**

CONSENSUS WERK

**EDITION 2004-2005**

CONSENSUS WERK

**EDITION 2004-2005**

CONSENSUS WERK



VOLG  
DE  
GIDS...

RIGHT, THATS YOUR STOPOVER IN INDIA  
COVERED. LET'S GET STARTED ON AFRICA!



# 1987 – POLIOMYELITIS

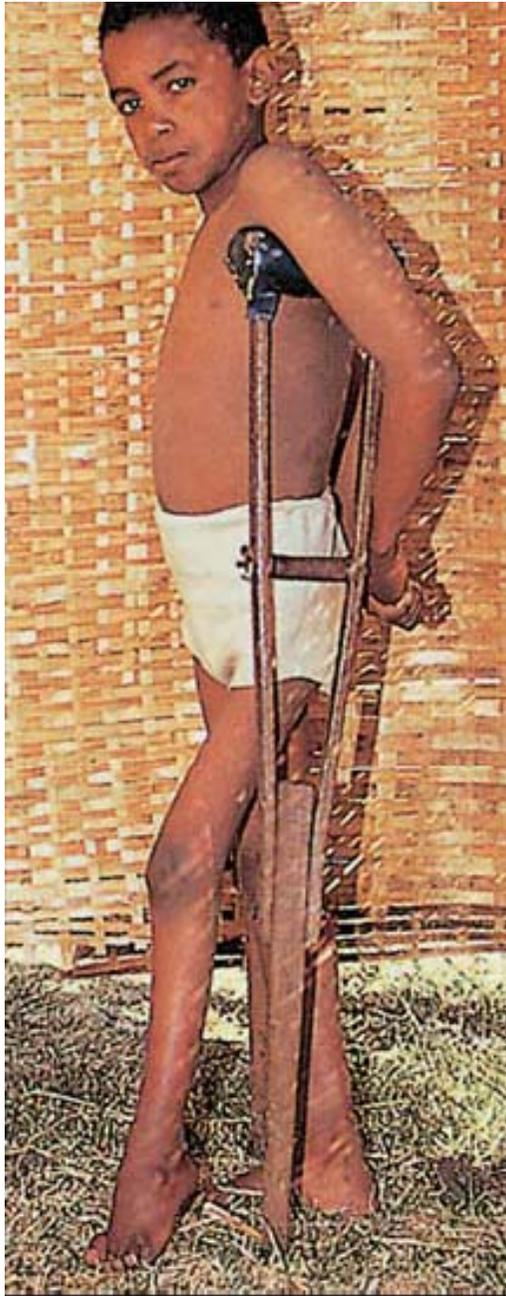
Acta Clin Belg. 1987;42(3):168-72.

**Poliomyelitis in an airline pilot and the need for vaccination of travellers.**

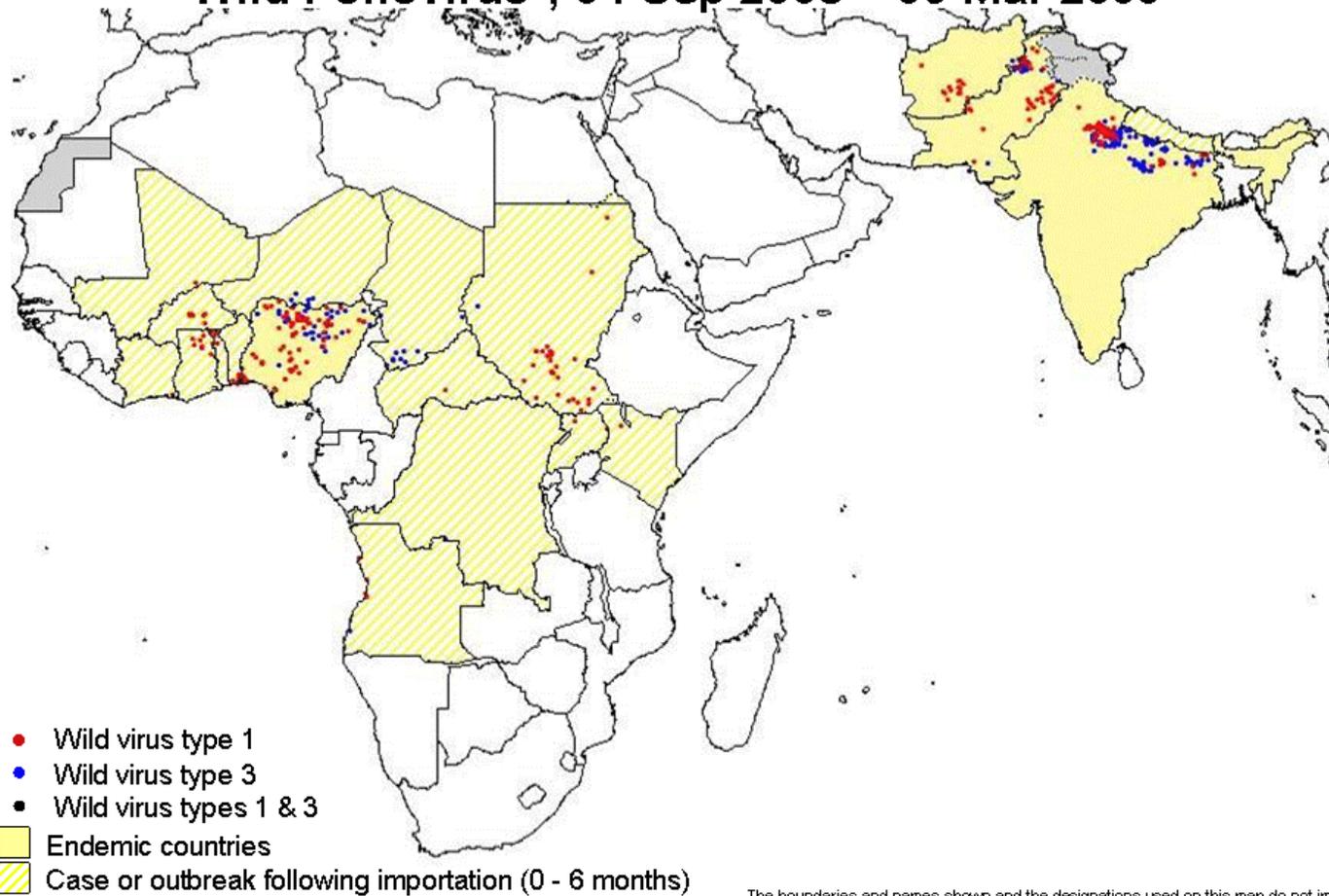
Goubau P, Carton H, Taelman H, Druyts-Voets E, Desmyter J.

PMID: 3661044 [PubMed - indexed for MEDLINE]

- 52 y old , not vaccinated, leaving the ITG in a wheelchair after an infection acquired in Senegal
- Since that time, all travelers to countries “not free of polio ” were advised to receive a “once a live” booster at adult age and/or a full vaccination.... (with the inactivated vaccine since 2003)



## Wild Poliovirus\*, 04 Sep 2008 – 03 Mar 2009



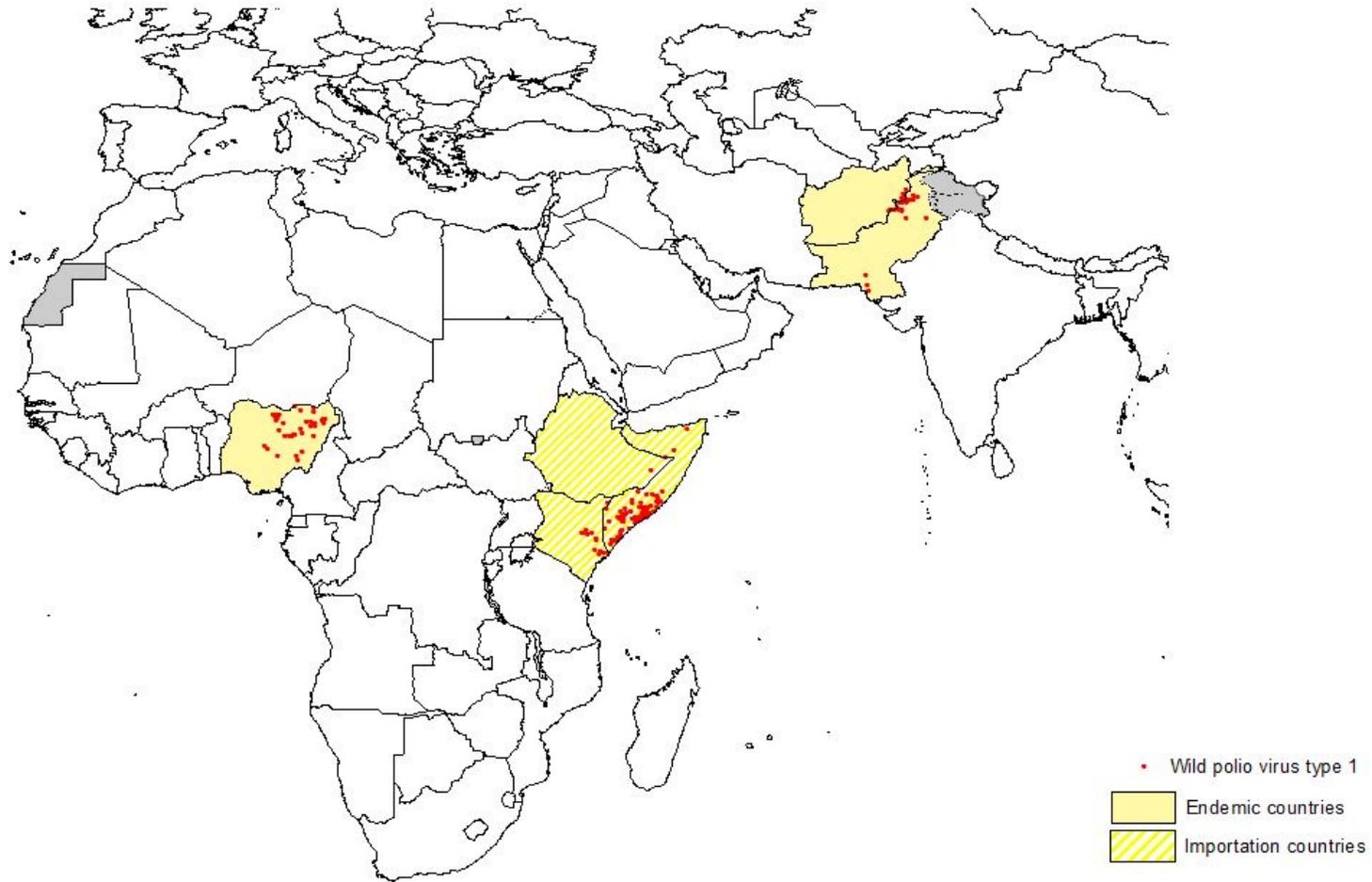
\*Excludes viruses detected from environmental surveillance and vaccine derived polio viruses.

Data in WHO HQ as of 03 Mar 2009

The boundaries and names shown and the designations used on this map do not imply the expression of any opinion whatsoever on the part of the World Health Organization concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries. Dotted lines on maps represent approximate border lines for which there may not yet be full agreement.  
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# Wild Poliovirus - 2013

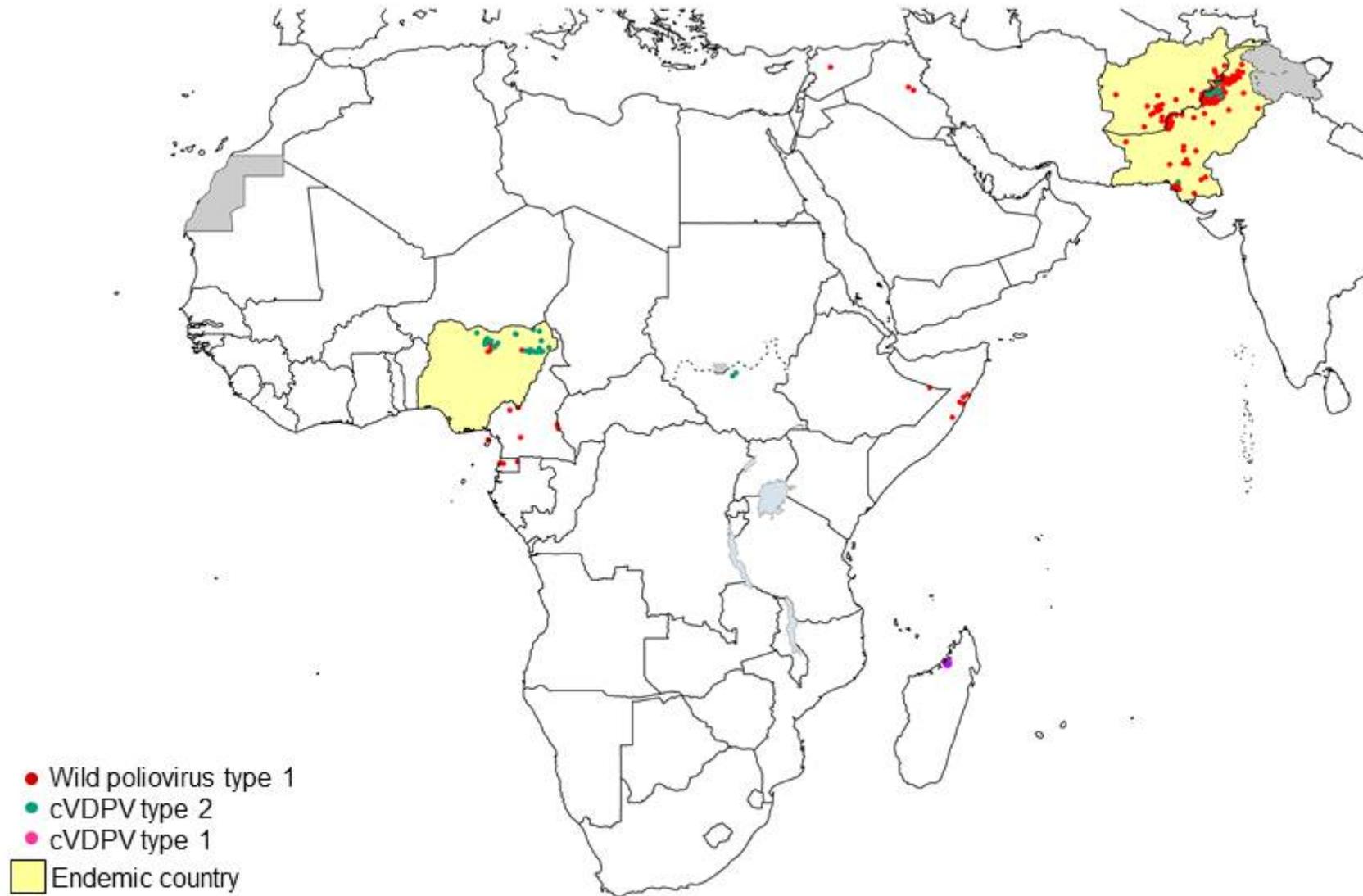
01 January - 10 September



Excludes vaccine derived polioviruses and viruses detected from environmental surveillance.

Data in HQ as of 10 September 2013

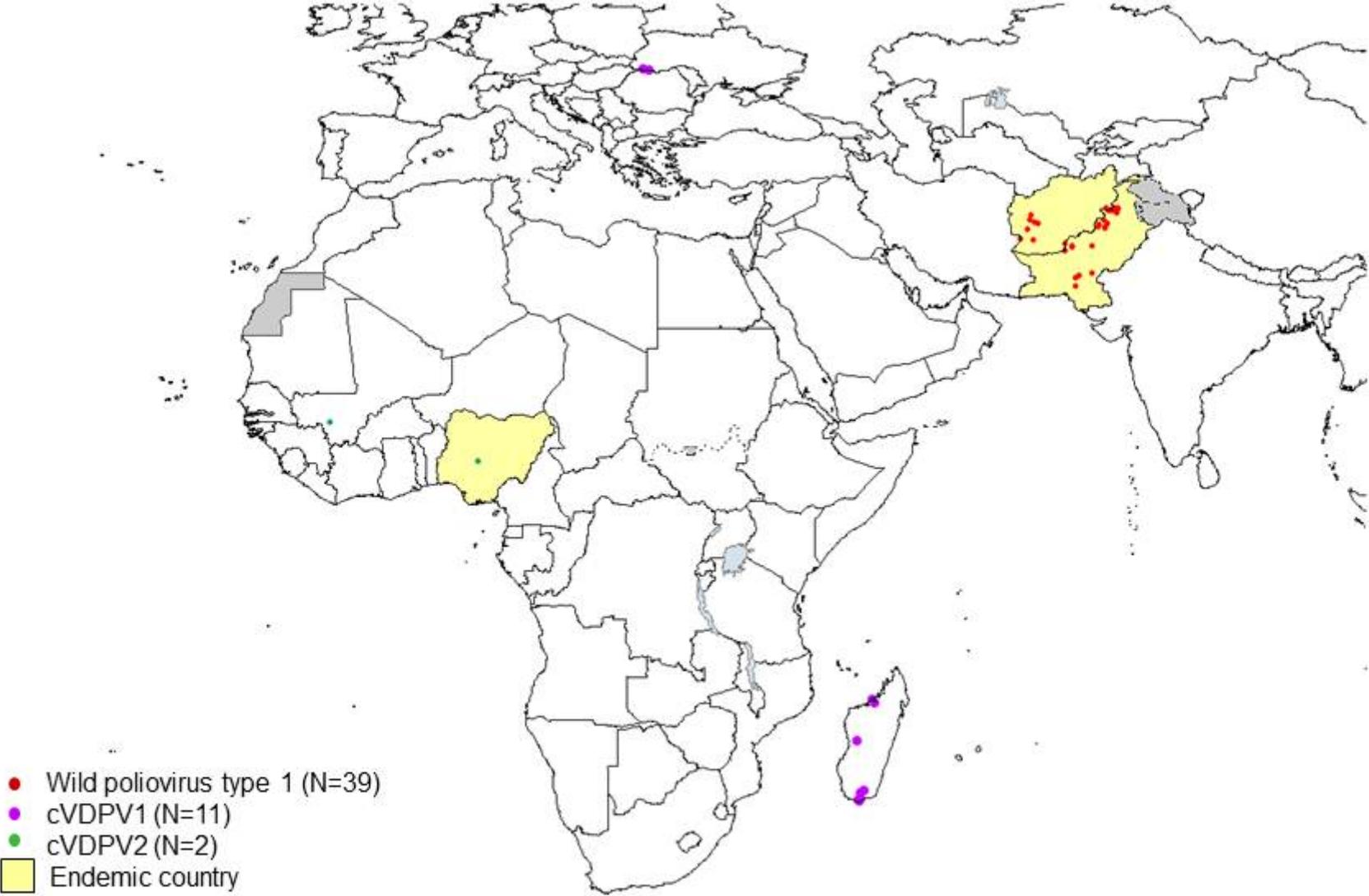
## Wild Poliovirus & cVDPV<sup>1</sup> Cases<sup>2</sup>, 2014 01 January – 31 December



<sup>1</sup>cVDPV is associated with  $\geq 2$  AFP cases or non-household contacts. VDPV2 cases with  $\geq 6$  ( $\geq 10$  for type1) nucleotides difference from Sabin in VP1 are reported here. <sup>2</sup>Excludes viruses detected from environmental surveillance.

Data in WHO HQ as of 19 May 2015

# Wild Poliovirus & cVDPV Cases<sup>1</sup>, 2015 01 January – 08 September



<sup>1</sup>Excludes viruses detected from environmental surveillance.

Data in WHO HQ as of 08 September 2015

# Polio...in 2015

- Less than 50 cases since january of 2015...

**The beginning of the end...???**

**But still years and years before the end  
of vaccination for travellers....**

DOCTOR OF  
PORCUPUNCTURE  
CERTIFICATE OF MERIT  
PRACTICED BY THE BEST IN THE FIELD  
SINCE 1888  
DIPLOMA GRANTING POWER AND HONOR  
ISSUED BY THE BOARD OF MEDICAL EXAMINERS

"WHERE DID  
YOU SAY  
YOU TRAINED?"

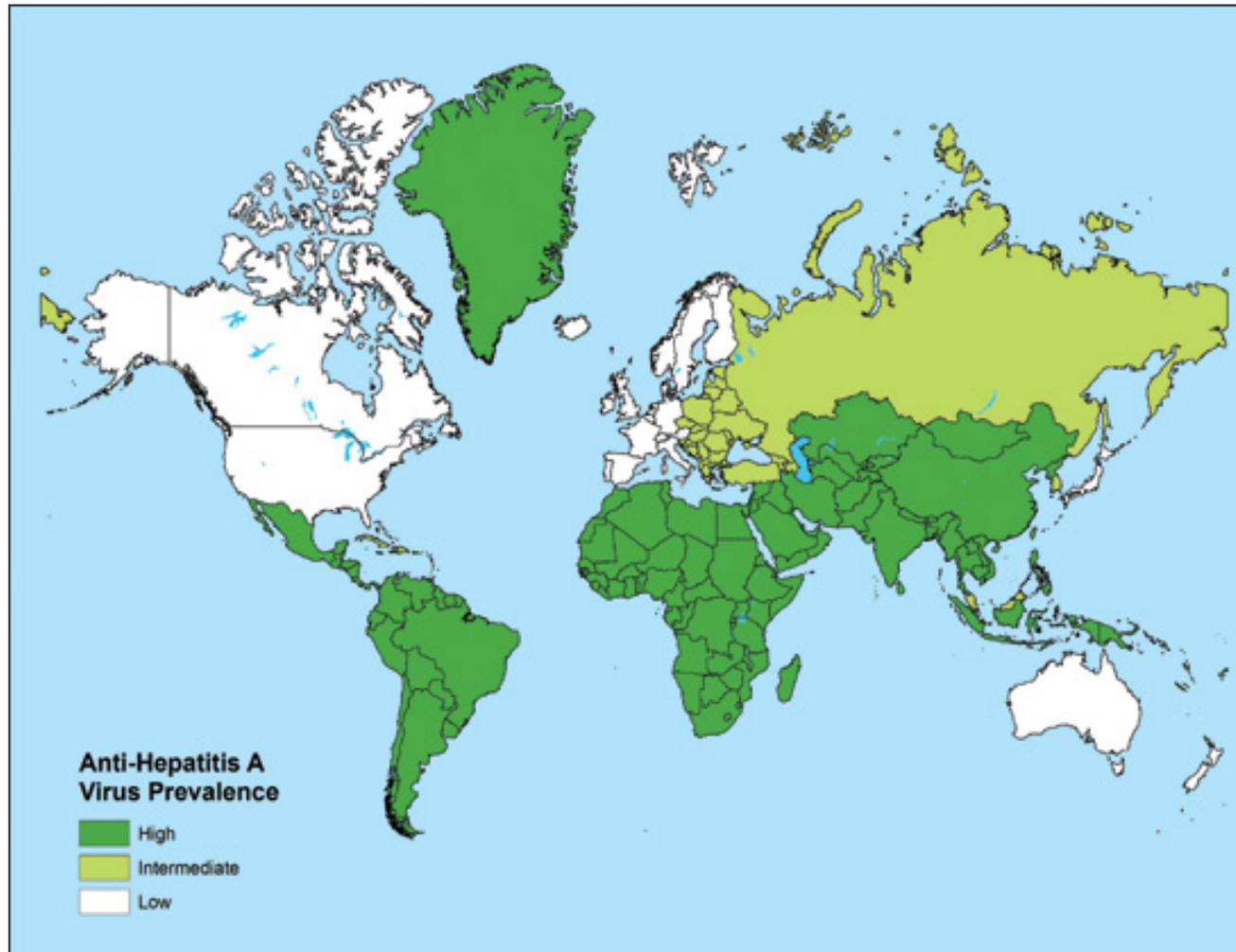
Rose Reden



# Hepatitis A

**Before or after 1992?**

## Prevalence of antibody to hepatitis A virus, by country, 2006.



## Monthly incidence rates in of hepatitis A in non-immune travelers to developing countries

Cases	Subjects	Duration of stay	Incidence rate	Ref Year(s)
7	7887 Swiss travelers, 60% non-immune (?)	mean 19 days	1 per 300	1 1981-84
52	108 French foreign aid volunteers	18-35m	1 per 50	2 1979-80
67	US Foreign Service personnel (n?)	N / A	≤1 per 5,000	3 1990-93
325*	Canadian travelers	variable	1 per 3000	4 1996-2001

## Monthly incidence rates of Hepatitis A in non-immune travelers to developing countries

	INCIDENCE RATE / MONTH	HA VACCINATION
Travel to:		
- Developing country	>0.1 / 1000	Recommended
- Asian / African Mediterranean	<1/1000	Recommended
- Eastern Europe	0.1/1000	Recommended, especially to VFR (!)
- Southern Europe	<<0.1 / 1000	No recommendation

now 1:3000

Old 'Steffen – Rate' 1:300 is obsolete!

# Hepatitis A

**-Before 1992: -IgG IM**

-partial protection for 3-6 months

(X in 1999)

**-Since 1992: Havrix** (followed by others)

**One of the most effective vaccine:**

(close to) 100% protection

lifelong (probably) in immunocompetent

With HAV/HBV vaccination since 1998 (Twinrix)

# 1993 Diphtheria in a belgian woman in Moskow



## Belgische sterft in Moskou aan difterie

MOSKOU — Een 62-jarige toeriste uit 'Schaarbeek overleed woensdag in Moskou aan difterie. Dat werd gisteren gemeld door de Belgische konsul in de Russische hoofdstad, Vincent Cauberg, en bevestigd door het ministerie van Buitenlandse Zaken in Brussel. De ongehuwde vrouw reisde individueel en logeerde bij vrienden. De Vereniging van Vlaamse Reisbureaus benadrukt dat dit geval, hoe spijtig ook, de „klassieke“ toerist niet hoeft af te schrikken. Er is geen enkele reden tot paniek.

De vrouw overleed al woensdag in een ziekenhuis in Moskou, zo blijkt uit een rapport dat de Russische autoriteiten aan de Belgische ambassade overhandigden.

De 62-jarige ongehuwde toeriste was sinds het begin van de maand in Rusland. Ze reisde individueel, zonder assistentie van een reisbureau. Gisterenmiddag was weinig bekend

over de steden die ze naast Moskou nog zou hebben bezocht. Ze verbleef bij vrienden.

„Antoon Van Eeckhout merkt namens de Vlaamse Vereniging van Reisbureaus op dat de „klassieke“ toerist zich geen zorgen hoeft te maken. „Voor toeristen die naar normale hotels gaan, normaal eten en normaal contact met de bevolking hebben, zijn er geen problemen. Hoe erg het voor die vrouw ook is, het kan niet dat een dodelijk geval van difterie wordt opgeblazen. Van een geval mag men geen probleem maken voor de reisindustrie.“

„De Belgische noch de Russische overheid vinden dat er speciale maatregelen voor toeristen getroffen moeten worden. Wij moeten niet heiliger willen zijn dan de paus“, zegt Marc Lenaerts namens VTB. „We hebben drie groepen in Rusland zitten, en alles verloopt normaal.“

### Inentingen

Sedert het begin van dit jaar zijn in Rusland ruim 4.000 ge-

vallen van difterie geregistreerd. Deze besmettelijke ziekte lijkt in een beginstadium op angina, keel- of longontsteking. De bacterie die de ziekte veroorzaakt, werkt immers in op de slijmvliezen. Hart en zenuwstelsel kunnen ook worden aangetast.

Door inenting tijdens de kinderjaren zijn westerlingen tot hun veertigste tegen de ziekte beschermd. Nadien kan een nieuwe inenting nuttig zijn, zeker voor reizigers die naar streken gaan waar hygiëne en algemene levensomstandigheden minder goed zijn.

„Minstens honderd mensen overleden in Rusland aan difterie sinds de Wereldgezondheidsorganisatie er de ziekte begin dit jaar als epidemie kwalificeerde. De toeriste uit Schaarbeek zou het eerste Westeuropese slachtoffer zijn. De Russische autoriteiten kondigden aan een grote vaccinatiecampagne te zullen starten om difterie en andere oprukkende besmettelijke ziekten de pas af te snijden.“

(le dix-huit août mille neuf cent nonante-trois) à l'âge de soixante-deux ans, dont l'inscription a été faite dans le registre des actes de décès le 19 août 1993 sous le numéro 1397.  
Cause du décès - insuffisance respiratoire aiguë.  
Nombreuses pellicules à caractère diphtérique à l'entrée de la cavité bronchiale. Diphtérie.

Lieu de décès ville, village : Moscou  
Arrondissement :  
République : Russie  
Lieu de l'enregistrement : Cachet

Date de délivrance : le 19 août 1993

Cachet

Officier des actes de l'état civil : signature

X MJ N. 490576

Traduction conforme au texte original en russe faite par l'Ambassade de Belgique à Moscou le 19 août 1993.



V. Caubergs  
Vice-consul



# Diphtheria

- **At that time:**

*no vaccine for adults !*

only tetanos for adults

tetanos-diphtheria for children

to mix for adult vaccination.....!!

⇒**1997**: Tedivax pro adulto on the market

- **2015**:All the tetanos vaccines contain at least the right amount of diphtheria antigen for adult immunisation

+ polio (Revaxis) since 2000

+ pertussis (Boostrix) since 2004

# Second National Seminar on Travel Medicine

## INFECTIOUS DISEASES IN TRAVELERS

**Thursday 13 November 1997**

Auditorium  
Congress Centre of Woluwe-St-Pierre  
av Charles Thielemans 93  
1150 Brussels  
BELGIUM

Pr. A. Van Gompel (ITG)  
Dr. R. Snacken (IHE)  
Dr. F. Jacobs (ULB-Hôpital Erasme)  
Pr. W. Peetermans (K.U.L.-Leuven)  
Dr. Y. Van Laethem (ULB-Hôp. St. Pierre)  
Dr. D. Vogelaers (KUG-Gent)  
Dr. P. Desmidt (Militair Ziekenhuis Konigin Astrid)

## PROGRAM

13.30	<i>Registration</i>	
14.00	<b>Malaria</b>	
		Dr. D. Vogelaers Dr. F. Jacobs
14.30	<b>Fever other than malaria</b>	
		Dr. F. Jacobs Pr. A. Van Gompel
15.00	<b>Enterocolitis after travel in (sub)tropics</b>	
		Pr. W. Peetermans Dr. Y. Van Laethem
15.30	<b>Medical evaluation of adopted children</b>	
		Dr. T. Jonckheer (Antwerpen)
16.00	<i>Coffee break and visit to the exposition</i>	
16.30	<b>Skin problems in travelers</b>	
		Dr. E. Caumes (Paris)
17.00	<b>Legal aspects of travel advice</b>	
		Prof. Th. Van Sweefeld (U.I.A.-Antwerpen)
17.30	<b>News from the Travel Medicine Congress (Geneva)</b>	
		Pr. A. Van Gompel Dr. R. Snacken
18.00	<i>The end</i>	

# Third National Seminar On Travel Medicine

## TOPICS IN TRAVEL MEDICINE TRAVELLERS AT RISK ARTHROPOD-TRANSMITTED DISEASES

Thursday 25 November 1999

Auditorium  
Congress Centre of Woluwe-St-Pierre  
Av Charles Thielemans 93  
1150 Brussels  
BELGIUM

programme

14.00-18.00

Part I Travellers at risk

1. Pregnant women - children : A. Van Gompel + C. Van Goethem
2. Immunocompromised travelers : W. Peetermans + Y. van Laethem
3. Travel medicine and Trekking : Pr. Robert Naje

Part II Arthropod transmitted diseases

1. Ticks and lice : rickettsioses, bartonellosis, etc : Pr. D. Raoult
2. Insect vectors and repellents : Pr. M. Coosemans (entomologist IMT)

Special : Update + flashes after the 6<sup>th</sup> ISTM Congress Quebec June 1999

1  
Pr. A. Van Gompel (ITG)  
Dr. R. Snacken (IPH)  
Dr. F. Jacobs (ULB-Hôpital Erasme)  
Pr. W. Peetermans (K.U.L.-Leuven)  
Dr. Y. Van Laethem (ULB-Hôp. St. Pierre)  
Dr. D. Vogelaers (KUG-Gent)  
Dr. P. Desmidt (Militair Ziekenhuis Konigin Astrid)

powerpoints

## UN CAS DE FIEVRE HEMORRAGIQUE A VIRUS EBOLA A LIBREVILLE (GABON) RESPONSABLE D'UN DECES APRES EVACUATION EN AFRIQUE DU SUD

Depuis son émergence en 1976, la fièvre hémorragique à virus Ebola (FHVE) évolue sous forme épidémique en Afrique noire (1, 2). Une épidémie due au virus Ebola s'est déclarée au Gabon en septembre 1996 dans la province de l'Ogooué-Ivindo située à l'est du pays (3). Cette épidémie, troisième enregistrée au Gabon, a sévi à Booué en 1996-1997 et a été responsable de 52 cas et de 40 décès (77 p. 100); elle est survenue après celles de Minkouka (1994-1995) avec 49 cas et 28 décès (57 p. 100) et de Mayibout (1996) avec 37 cas et 21 décès (57 p. 100) (4, 5). Elle a été à l'origine de contaminations observées chez un personnel soignant et dans des familles. Parmi ces patients figure un médecin gabonais ayant été évacué en Afrique du Sud pour syndrome infectieux sévère en l'absence de diagnostic étiologique initial. Du fait des difficultés diagnostiques, cette FHVE n'a pas été reconnue et a été responsable d'un décès parmi le personnel soignant sud-africain.

Med Trop

1999-59-4-411

O. M., 40 ans, médecin réanimateur sans facteurs de risque connus pour la FHVE, a présenté un syndrome infectieux le 19 octobre 1996 pour lequel il a reçu du Paluther® sans succès. Il a été hospitalisé le 24 octobre 1996 dans un tableau de gastroentérite fébrile et algique. Le bilan biologique a révélé une détérioration de la fonction hépatique avec une élévation importante des enzymes hépatiques (ALAT = 530 UI/L;  $\gamma$ GT = 111 UI/L; phosphatases alcalines = 234 UI/L) et une rhabdomyolyse (CPK = 878 UI/L; LDH = 10740 UI/L). Toutes les investigations complémentaires réalisées sont restées négatives : (sérologies des hépatites A, B, C, D, salmonellose, VIH, amibiase). La recherche d'une infection par le virus Ebola n'a pas été envisagée malgré le contexte épidémiologique. En cours d'hospitalisation est apparue une insuffisance rénale. Après 4 jours, devant l'aggravation de la symptomatologie et en l'absence de diagnostic étiologique, le malade a été évacué en Afrique du Sud (Johannesbourg) le 27 octobre 1996. A l'arrivée, on constatait des oedèmes des extrémités, des râles crépitants aux bases pulmonaires. Le bilan biologique restait perturbé, la tomodensitométrie abdominale et l'endoscopie digestive haute et basse étaient normales. On retrouvait un *Clostridium difficile* dans la coproculture. Un traitement par quinolone fluorée, métronidazole et vancomycine a été instauré sans entraîner d'amélioration. Devant la persistance d'une fièvre irrégulière atteignant 42°C et d'une rhabdomyolyse, le patient a été mis sous corticothérapie à forte dose (800 mg par jour) par voie IV. Une apyrexie a été obtenue très rapidement et son état s'est amélioré. Le malade a quitté le service le 11 novembre 1996.

Le diagnostic de FHVE sera porté sur la culture cellulaire et la présence d'anticorps spécifiques anti-virus Ebola (*National Institute for Virology, Sandrighan, South Africa*) chez une infirmière qui s'était occupée de lui au cours de son hospitalisation. Celle-ci est tombée malade le 9 novembre 1996; elle a présenté une hématurie le 14 novembre et est décédée le 24 novembre 1996.

# **Fourth National Seminar on Travel Medicine**

**Thursday 22 November 2001**

## **Topics in Travel Medicine**

**Dangers of the sea and the wilderness**

# Program

13.30 *Registration*

14.00 **Diving : malaria prophylaxis and dangers of the sea**

Dr. B. Stockman (UZA Antwerpen)

14.40 **Snakes**

Dr. E. Van den Enden (ITM Antwerpen)

15.20 *Coffee break and visit to the exhibition*

15.50 **Vaccinations in the last minute or low budget traveller**

Pr. A. Van Gompel

**16.20 Update on antimalarials**

Dr. Y. Van Laethem

Pr. B. Vandercam

**16.50 Late breakers - biological warfare**

Pr. R. Peleman

**17.10 Flashes from the 7th International Society of Travel**

**Medicine Congress in Innsbruck**

Pr. A. Van Gompel & Dr. F. Jacobs

17.25 *The end*

**The yellow fever year...**

# November 2001 Yellow fever from Gambia

## A Belgian Traveler Who Acquired Yellow Fever in The Gambia

**R. Colebunders,<sup>1,2</sup> J.-L. Mariage,<sup>3</sup> J.-Ch. Coche,<sup>3</sup> B. Pirenne,<sup>3</sup>  
S. Kempinaire,<sup>3</sup> Ph. Hantson,<sup>4</sup> A. Van Gompel,<sup>1</sup> M. Niedrig,<sup>5</sup>  
M. Van Esbroeck,<sup>1</sup> R. Bailey,<sup>7</sup> C. Drosten,<sup>6</sup> and H. Schmitz<sup>6</sup>**

<sup>1</sup>Institute of Tropical Medicine and <sup>2</sup>University Hospital Antwerp, Antwerp,  
<sup>3</sup>Clinic St.-Pierre, Ottignies, and <sup>4</sup>St.-Luc Hospital, Université Catholique  
de Louvain, Brussels, Belgium; <sup>5</sup>Robert Koch Institute, Berlin, and <sup>6</sup>Bernard  
Nocht Institute for Tropical Medicine, Hamburg, Germany; and <sup>7</sup>Clinical Services  
Medical Research Council, Fajara, The Gambia

**A 47-year-old Belgian woman acquired yellow fever during a 1-week vacation in The Gambia; she had never been vaccinated against yellow fever. She died of massive gastrointestinal bleeding 7 days after the onset of the first symptoms. This dramatic case demonstrates that it is important for persons to be vaccinated against yellow fever before they travel to countries where yellow fever is endemic. CID 2002:35 (15 November) • e113. If the country, like The Gambia, does not require travelers to be vaccinated.**

**But also** the first descriptions  
of severe side effects of yellow  
fever vaccination.....



**"If you remember,  
I did mention possible side-effects."**

**But also** the first descriptions of  
severe side effects of yellow  
fever vaccination, **leading to....**

TABLE 2. Contraindications and precautions to yellow fever vaccine administration

**Contraindications**

- Allergy to vaccine component
- Age less than 6 months
- Symptomatic HIV infection or CD4<sup>+</sup> T-lymphocytes <200/mm<sup>3</sup> (or <15% of total in children aged <6 years)\*
- Thymus disorder associated with abnormal immune function<sup>†</sup>
- Primary immunodeficiencies
- Malignant neoplasms
- Transplantation
- Immunosuppressive and immunomodulatory therapies<sup>†</sup>

**Precautions**

- Age 6–8 months
- Age ≥60 years<sup>†</sup>
- Asymptomatic HIV infection and CD4<sup>+</sup> T-lymphocytes 200–499/mm<sup>3</sup> (or 15%–24% of total in children aged <6 years)\*
- Pregnancy
- Breastfeeding

**Relapsing remitting MS**

And proudly, the birth of  
our logo.....

Instituut voor Tropische Geneeskunde  
Nationalestraat 155  
2000 Antwerpen

Wetenschappelijk Instituut voor Volksgezondheid  
Rue J. Wytsman 14  
1050 Brussel



Wetenschappelijke Studiegroep Reisgeneeskunde  
Groupe d'Etude Scientifique de la Médecine des Voyages

# 5<sup>th</sup> National Seminar on Travel Medicine

Friday 14 November 2003

Centre culturel of Woluwé-St-Pierre, Brussels

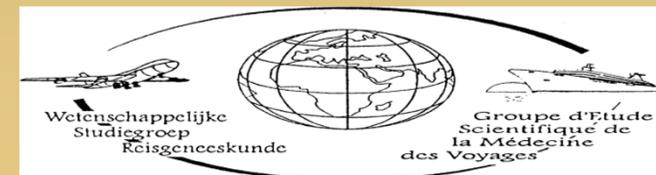
## MEDICAL ISSUES POST TRAVEL

**Chairmen: Prof. Van Gompel and W. Peetermans**

- 14.00-14.05**      **Introduction**
- 14.05-14.45**      **Blood donation after travel**  
J. Barbara (London), L. Muyle (Antwerp),  
B. Vandercam (Brussels)
- 14.45-15.15**      **Post-travel screening**  
A. Van Gompel (Antwerp)
- 15.15-15.45**      **Medical screening for refugees**  
E. Bruynseels (Kapellen)
- 15.45-16.15**      *Coffee break*
- 16.15-16.45**      **Medical reasons for emergency evacuation**  
MJ Oyen (Brussels)
- 16.45-17.15**      **Medical advices for SE Asia**  
Y. Van Laethem (Brussels)
- 17.15-17.35**      **Recent epidemics**  
R. Peleman (Gent)
- 17.35-17.50**      **Flashes from the 8th International Society of  
Travel Medicine,  
New York, 2003**  
B. Vandercam (Brussels), F. Jacobs (Brussels),  
A. Van Gompel (Antwerp)
- 17.50-18.00**      **Closing remarks**  
W. Peetermans (Leuven)

### Information

Clinique des Maladies Infectieuses  
Hôpital Erasme  
Route de Lennik, 808  
1070 Brussels  
Phone +32/2/555 6746  
Fax +32/2/555 3912  
Email :maladies.infectieuses.erasme@ulb.ac.be  
**Accreditation:** 40 UFC  
**Fees:** 30€





## Sixth National Seminar on Travel Medicine

### INFECTION PREVENTION IN TRAVELERS

Friday 25 November 2005

Sodehotel La Woluwe  
Av. Emmanuel Mounierlaan 5  
1200 Brussels  
BELGIUM

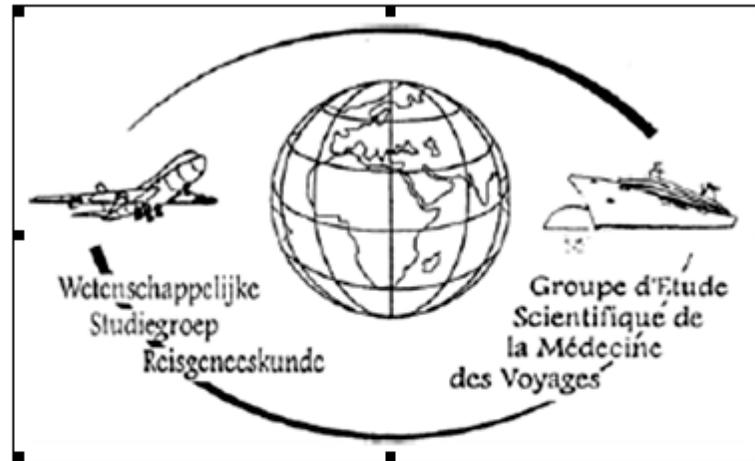
#### Organising committee

Wetenschappelijke Studiegroep Reizeneeskunde / Groupe d'Etude Scientifique de la Médecine des Voyages

Pr. A. Van Gompel (ITG),  
Dr. R. Snacken (WIV- LP),  
Pr. F. Jacobs (Hôp. Erasme, ULB),  
Pr. W. Peetermans (U.Z. - K.U.Leuven),  
Pr. Y. Van Laethem (Hôp. St. Pierre, ULB), Pr. B. Vandercam (Hôp. St. Luc, UCL),  
Pr. R. Peleman (UZ. - U.Gent) Dr. P. Lacor (AZ-VUB), Dr. Ph. Leonard (CHU-ULg).

## PROGRAM

13.00-14.00	<i>Welcome - Registration</i>
14.00-14.05	<b>Introduction</b>
14.05-14.45	<b>Malaria Prophylaxis – case-discussion, interactive session</b> A. Van Gompel ( <a href="#">Antwerp</a> ) & Ph. Leonard ( <a href="#">Liège</a> ) P. Lacor (Brussels) & Y. Van Laethem (Brussels)
14.45-15.15	<b>Infection prevention for expatriates &amp; long-term <u>travelers</u></b> A. Van Gompel (Antwerp)
15.15-15.45	<b>Infection prevention for travel to Latin America</b> Y. van Laethem (Brussels)
15.45-16.15	<i>Coffee break &amp; visit boots commercial exhibition</i>
16.15-17.00	<b>Vaccination in special travellers – case-discussion, interactive session</b> W. Peetermans (Leuven) B. <a href="#">Vandercam</a> (Brussels) F. Jacobs (Brussels) & R. <a href="#">Snacken</a> (Brussels)
17.00-17.25	<b>Recent epidemics</b> R. Peleman (Gent)
17.25-17.50	<b>Flashes from the 9<sup>th</sup> International Society of Travel Medicine, Lisbon, 2005</b> B. Vandercam (Brussels) F. Jacobs (Brussels) A. Van Gompel (Antwerp)
17.50-18.00	<b>Closing remarks</b>



# Seventh National Seminar on Travel Medicine

ALL YOU WANT TO KNOW ON  
TRAVEL MEDICINE IN 2007

### Organising committee

Wetenschappelijke Studiegroep Reisgeneeskunde / Groupe d'Etude Scientifique de la Médecine des Voyages

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# PART 1

## PROGRAM

- 14.00-14.05      **Introduction**
- 14.05-14.50      **Yellow fever vaccination and risks revisited :  
immunosuppressive conditions and age**  
F. Jacobs (Brussels), A. Van Gompel (Antwerp)
- 14.50-15.05      **Allergic and other reactions after insect bite from the tropics**  
P. Leonard (Brussels)
- 15.05-15.35      **Update on encephalitis vaccines : japanese encephalitis, tick  
borne encephalitis, rabies**  
P. Lacor (Brussels), B. Vandercam (Brussels)
- 15.35-16.00      *Coffee break*

# PART 2

- 16.00-16.30      **Side effects and other inconveniences of antimalarials : an update**  
W. Peetermans (Leuven), Philippe Leonard (Brussels)
- 16.30-17.10      **India & China : travel health information**  
A. Van Gompel (Antwerp), Y. Van Laethem (Brussels)
- 17.10-17.30      **Recent epidemics**  
R. Peleman (Gent)
- 17.30-18.00      **Flashes from the 10<sup>th</sup> International Society of Travel Medicine, Vancouver 2007 and what's new in travel medicine**  
F. Jacobs (Brussels), A. Van Gompel (Antwerp)



FIGURE 2—Rabid dog exhibiting aggressive behavior.



# Rabies

- From Day 1-7-21/28

+ a booster after one year

+ boosters every 3? 5?.... Years  
*until 2010*

to....

# Rabies

2010

- **Consensus 2010** : after the primo vaccination with three doses (day 0, day 7 – 14, day 28) and a booster injection after one year, the patient remains **lifelong boostable** – no further boosters are administered (conform UK, CH, Germany, ...)
- Post-exposure prophylaxis always remains indicated because pre-exposure vaccination must be considered as only partly protective.

*“Bedoeling is niet dat reizigers of expats permanent hoge antistoftiters hebben, wel dat ze levenslang ‘boostable’ zijn (= het immuungeheugen is door revaccinatie levenslang onmiddellijk aanspreekbaar),*

2012

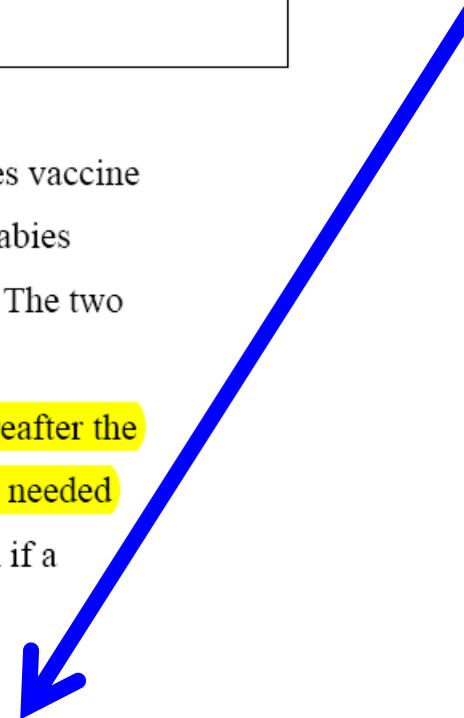
**BELGIAN CONSENSUS MEETING ON TRAVEL MEDICINE**

**25-05-2012**

Prophylactic rabies vaccine is no longer available via IPH/ WIV/ISP. Rabies vaccine is now commercially available in Belgium. (either Mériex or Novartis). Rabies vaccine Mériex® is reimbursed, but not Rabipur® (request still pending). The two vaccines are interchangeable and can be used for subsequent vaccination.

The vaccination scheme is 3 shots within one month. This is the basis whereafter the patient remains for decades (probably lifelong) boostable. So the only once needed booster dose can be given after one year or later. Every shot counts, so even if a

2013



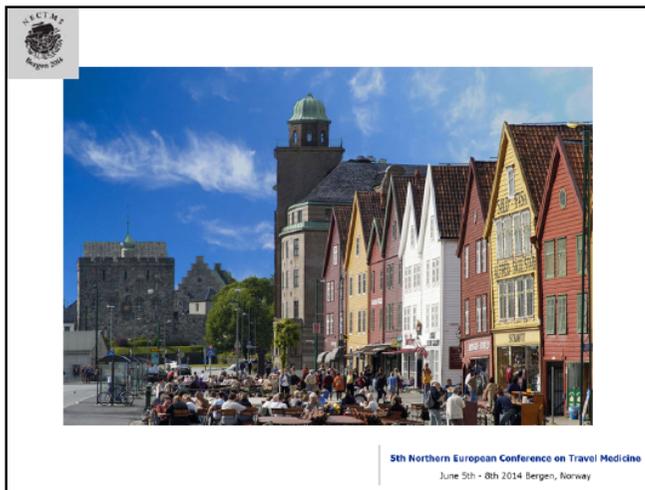
**From 31- 05 - 2013 on:  
no booster after 1 year or later is advised  
anymore for at least 20-30 years  
after the basic series of 3 shots (1-7-21/28)  
in persons with normal immunity**

# Rabies

- To **no** booster after the first 3 injections

*UNTIL*

bitten by a mammal !



# RABIES

## Accelerated schedule

- Accelerated schedules **(D1, D4, D8)**
- **not licenced = off label**
  - To be discussed with the client



“Yeah! That bite really spoils the skin!”

# Geographic distribution of Japanese encephalitis.





日本腦炎 登革熱  
齊來預防 把蚊滅

Down of  
Infectious Encephalitis  
and Dengue Fever  
Are Near!

日本腦炎  
2848 0000  
登革熱  
2848 0000

預防  
把蚊滅

預防  
把蚊滅





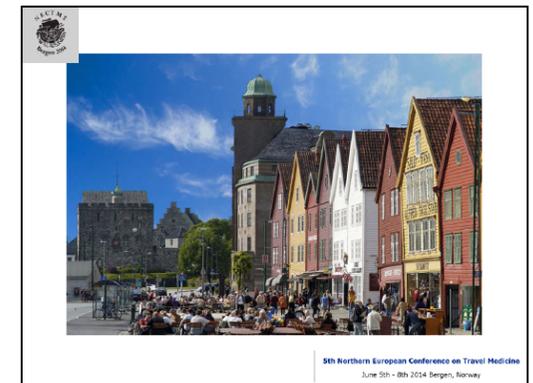
# Japanese encephalitis

- 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.**

# JAPANESE ENCEPHALITIS

Accelerated schedule:

- **Accelerated schedules (D1, D8)**  
not licenced = off label...**except in France**  
**and probably soon in Europe !**  
→ To be discussed with the client
- **“Long term protection”**: after booster at 1.5 y,  
protection at least for 6 years



Final publication of these data available online since 30 May 2015

Vaccine 33 (2015) 3600–3604

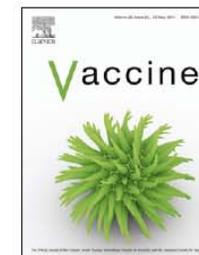


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Contents lists available at [ScienceDirect](#)

## Vaccine

journal homepage: [www.elsevier.com/locate/vaccine](http://www.elsevier.com/locate/vaccine)



### Persistence of antibodies six years after booster vaccination with inactivated vaccine against Japanese encephalitis



Maria Paulke-Korinek<sup>a,b</sup>, Herwig Kollaritsch<sup>a,\*</sup>, Michael Kundi<sup>c</sup>, Ines Zwazl<sup>a</sup>,  
Claudia Seidl-Friedrich<sup>a</sup>, Tomas Jelinek<sup>d</sup>

<sup>a</sup> Institute of Specific Prophylaxis and Tropical Medicine, Medical University of Vienna, Kinderspitalgasse 15, A-1090, Vienna, Austria

<sup>b</sup> Federal Ministry of Health, Austria

<sup>c</sup> Institute of Environmental Health, Center for Public Health, Medical University of Vienna, Kinderspitalgasse 15, A-1090, Vienna, Austria

<sup>d</sup> Berlin Center for Travel and Tropical Medicine, Berlin, Germany

Available online at [www.sciencedirect.com](http://www.sciencedirect.com)

ScienceDirect

journal homepage: [www.elsevierhealth.com/journals/tmid](http://www.elsevierhealth.com/journals/tmid)

## Evaluation of rabies immunogenicity and tolerability following a purified chick embryo cell rabies vaccine administered concomitantly with a Japanese encephalitis vaccine<sup>☆</sup>



Tomas Jelinek<sup>a</sup>, Jakob P. Cramer<sup>b</sup>, Sebastian Dieckmann<sup>c</sup>,  
Christoph Hatz<sup>d</sup>, Maria Paulke-Korinek<sup>e</sup>, Martin Alberer<sup>f</sup>,  
Emil C. Reisinger<sup>g</sup>, Marco Costantini<sup>h</sup>, Dieter Gniel<sup>i</sup>,  
Dietrich Bosse<sup>i</sup>, Maria Lattanzi<sup>h,\*</sup>

<sup>a</sup> Berlin Center for Travel and Tropical Medicine, Berlin, Germany

<sup>b</sup> Bernhard Nocht Institute for Tropical Medicine, Department of Clinical Research/University Medical Center Hamburg-Eppendorf, Department of Internal Medicine, Section Tropical Medicine, Hamburg, Germany

<sup>c</sup> Institute of Tropical Medicine and International Health, Charité-Universitätsmedizin Berlin, Germany

<sup>d</sup> Institute of Social and Preventive Medicine, University of Zürich, Switzerland

<sup>e</sup> Institute of Specific Prophylaxis and Tropical Medicine, Medical University Vienna, Austria

<sup>f</sup> Department of Infectious Diseases and Tropical Medicine, University of Munich, Munich, Germany

<sup>g</sup> Department of Tropical Medicine and Infectious Diseases, University of Rostock Medical School, Rostock, Germany

<sup>h</sup> Novartis Vaccines and Diagnostics Srl – a GSK company, Siena, Italy

<sup>i</sup> Novartis Vaccines and Diagnostics Srl – a GSK company, Marburg, Germany

Received 3 November 2014; received in revised form 30 April 2015; accepted 3 May 2015

Available online 18 May 2015



*Wetenschappelijke  
Studiegroep Reizgeneeskunde  
Groupe d'Etude Scientifique de  
la Médecine des Voyages*

**8th National Seminar on Travel Medicine**

**Thursday 19th November 2009**

Sodehotel - Woluwe - Brussels

Under the auspices of the SBIMC-BVIKM asbl-vzw

## **RISK ASSESSMENT AND PREVENTION**

**Chairmen: F. Van Gompel – W. Peetermans**

- Pr. A. Van Gompel (ITG),
- Pr. F. Jacobs (Hôp. Erasme, ULB),
- Pr. P. Lacor (UZ-Brussel),
- Dr. Ph. Leonard (CHU-ULg),
- Pr. W. Peetermans (U.Z. - K.U.Leuven),
- Pr. R. Peleman (UZ.-.U.Gent),
- Dr. S.Quoilin (iph.fgov.be),
- Pr. B. Vandercam (CHU. St. Luc, UCL),
- Pr. Y. Van Laethem (CHU. St. Pierre, ULB),
- Dr P. Soentjens (Belgian Army)

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- Pr. Y. Van Laethem (CHU. St. Pierre, ULB),
- Dr P. Soentjens (Belgian Army)

## PROGRAM - 1

- **14.00-14.05**
  - Introduction
- 14.05-14.40
  - Deep venous thrombosis – Prof. P. Hainaut, UCL Brussels
- 14.40-15.15
  - Sexually transmitted diseases – Dr. M. Crouchs, ITG Antwerp & GGD Hart voor Brabant NL
- 15.15-15.45
  - Vaccination of the immunocompromised travellers – Prof F. Van Gompel, ITG Antwerp
- **15.45-16.15**      *Coffee break*

## PROGRAM - 2

- 16.15-17.10  
Interactive cases :
  - Vaccinations for Mekka pilgrims : Pr. Y. Van Laethem, CHU
  - Vaccinations and allergies : Dr.I. De Schutter, UZ Brussels
- 17.10-17.30
  - Recent epidemics : Prof. R. Peleman/Dr. S. Callens, UZ Ghent
- 17.30-**18.00**
  - Flashes from the 11th International Society of Travel Medicine, Budapest 2009 and what's new in travel medicine : Prof. B. Vandercam, UCL Brussels – Prof. F. Van Gompel, - ITG Antwerp
  - Prof. F. Jacobs, Hôpital Erasme Brussels



**Wetenschappelijke  
Studiegroep Reisgeneeskunde  
Groupe d'Etude Scientifique de  
la Médecine des Voyages**

**9th National Seminar on Travel Medicine  
Thursday 17th November 2011**

Sodehotel – Avenue Mounier 5, 1200 Brussel (<http://www.sodehotel.net>)

## **TAILORING PRE-TRAVEL ADVICE TO THE INDIVIDUAL TRAVELLER**

“Under the auspices of the BVIKM-SBIMC asbl-vzw”

**Chairmen: Prof. F. Van Gompel – Prof. W. Peetermans**

- Pr. A. Van Gompel (ITG),
- Dr. S. Callens (UZ.-U.Gent),
- Pr. F. Jacobs (Hôp. Erasme, ULB),
- Pr. P. Lacor (UZ-Brussel),
- Dr. Ph. Leonard (CHU-ULg),
- Pr. W. Peetermans (U.Z. - K.U.Leuven),
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# Organising committee

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- Pr. A. Van Gompel (ITG),
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- Pr. Y. Van Laethem (CHU. St. Pierre, ULB),
- Dr P. Soentjens (Belgian Army)



# TAILORING PRE-TRAVEL ADVICE TO THE INDIVIDUAL TRAVELLER

## PROGRAM - 1

- |             |  |
|-------------|--|
| 14.00-14.05 | Introduction   |
| 14.05-14.30 | <b>Acute Mountain Sickness</b> – Dr. M. Croughs, ITG Antwerp & GGD Hart voor Brabant NL  |
| 14.30-14.50 | <b>Jet Lag</b> – Pr. F. Van Gompel, ITG Antwerp  |
| 14.50-15.15 | <b>Dengue Fever Vaccines in the pipeline – New Yellow Fever Vaccines</b> – Pr. Y. Van Laethem, CHU St-Pierre Brussels  |
| 15.15-15.35 | <b>Prevention of Meningococcal Disease in travellers: Polysaccharide Vaccine or Conjugated Vaccine ?</b> – Pr. B. Vandercam, UCL Brussels & Pr. F. Van Gompel, ITG Antwerp |
| 15.35-16.00 | <i>Coffee break</i>  |

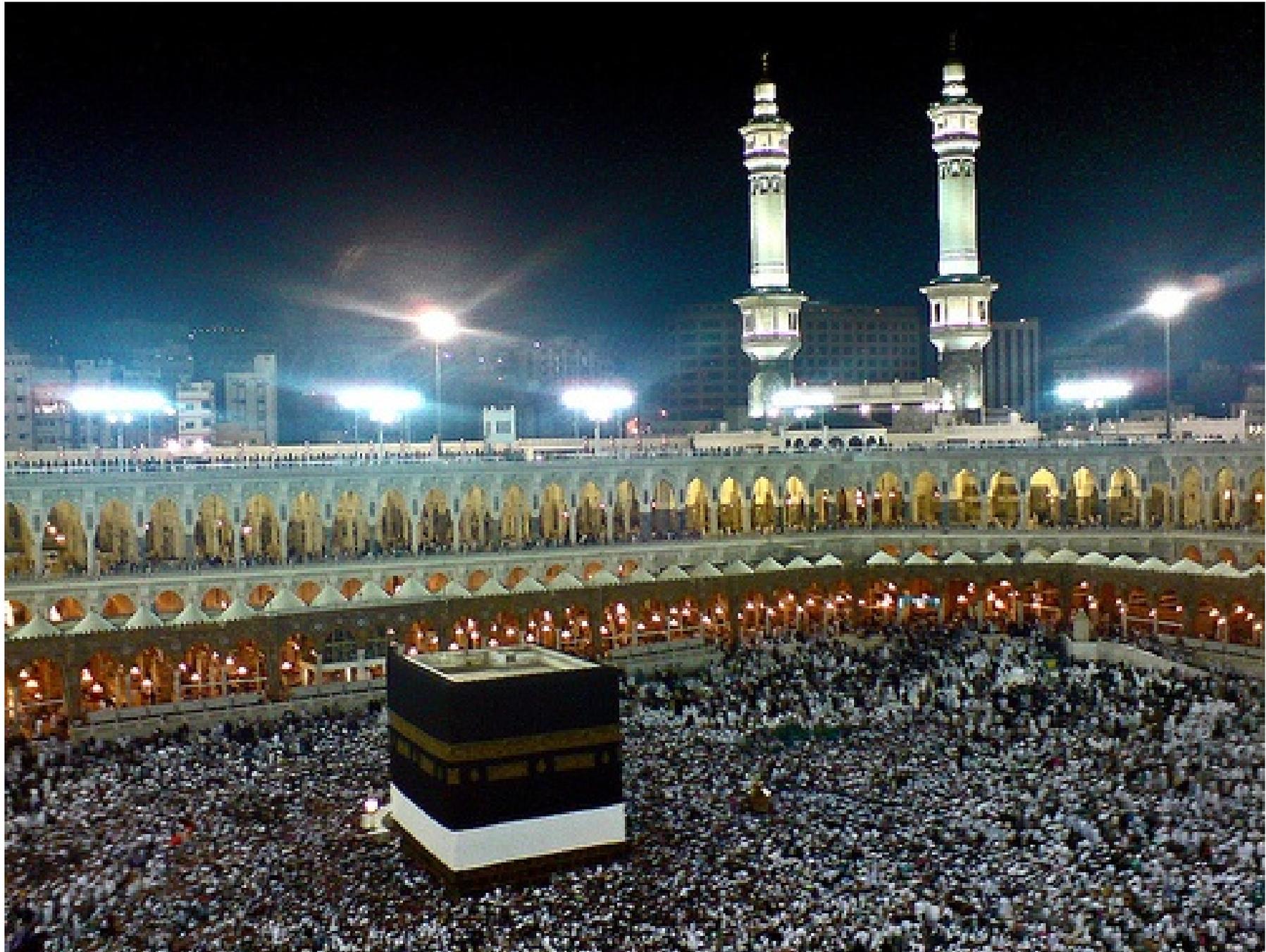
# TAILORING PRE-TRAVEL ADVICE TO THE INDIVIDUAL TRAVELLER

## PROGRAM - 2

- 16.00-16.35      **Child Traveller: tourist and expat** – Dr. F. Sorge, Hôpital Necker, Paris
- 16.35- 17.05      **Medical preparation for travelling to Australia & the three archipelagos (Indonesia, Philippines, Malaysia)** – Pr. Y. Van Laethem, CHU St-Pierre Brussels
- 17.05-17.20      **Recent epidemics** – Dr. S. Callens, UZ Ghent
- 17.20-17.35      **Flashes from the 12<sup>th</sup> International Society of Travel Medicine, Boston 2011 and what's new in travel medicine**  
**WHO-CDC** Prof. F. Van Gompel, - ITG Antwerp – Prof. F. Jacobs, Hôpital Erasme Brussels
- 17.35              CONCLUSION

# **Meningitis vaccination for pilgrims to Mecca**

(SINCE 2003)



## Areas with frequent epidemics of meningococcal meningitis.



# Meningitis

- **Mostly A** (in the past, before vaccination in African meningitis belt with conjugated meningo A vaccine)
- Increasing W135 in some countries
- Recent problems linked to type X (no vaccine)  
C since 2015

# Meningitis

- **From a less potent 4v polysaccharide vaccine**  
(Mencevax, not anymore on the market)

**to 4v conjugated vaccines**

(Menveo and Nimenrix)

- With better (?) and **longer immunity**  
(at least 5 years; ? for the A valence)

---

Eurosurveillance, Volume 17, Issue 21, 24 May 2012

Rapid communications

**W135 INVASIVE MENINGOCOCCAL INFECTIONS IMPORTED FROM SUB-SAHARAN AFRICA TO FRANCE, JANUARY TO APRIL 2012**

I Parent du Châtelet ([i.parent@invs.sante.fr](mailto:i.parent@invs.sante.fr))<sup>1</sup>, P Barboza<sup>1</sup>, M K Taha<sup>2</sup>

1. French Institute for Public Health Surveillance (Institut de veille sanitaire -InVS), Saint-Maurice, France
2. National Reference Center for Meningococci, Institut Pasteur, Paris France

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Citation style for this article: Parent du Châtelet I, Barboza P, Taha MK. W135 invasive meningococcal infections imported from Sub-Saharan Africa to France, January to April 2012. Euro Surveill. 2012;17(21):pii=20181. Available online: <http://www.eurosurveillance.org/ViewArticle.aspx?ArticleId=20181>

Date of submission: 14 May 2012

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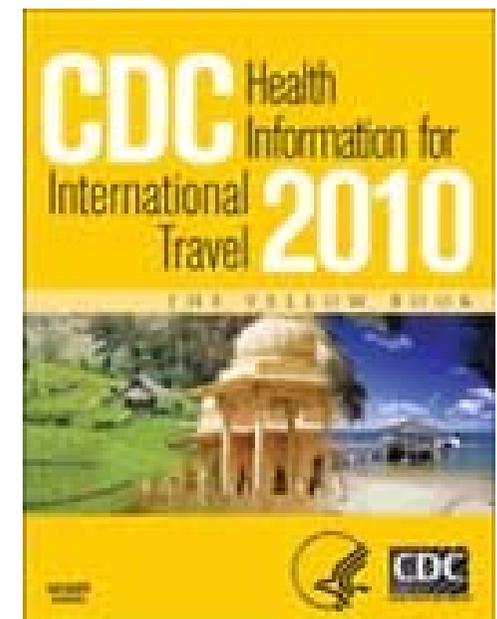
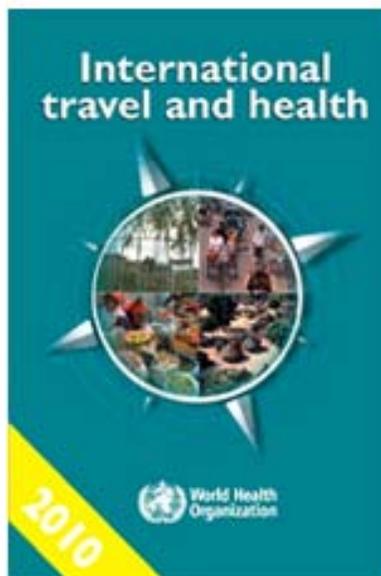
**From January to April 2012, 16 cases of W135 invasive meningococcal infection were reported in France. Of these, eight were linked to a recent travel history to Sub-Saharan Africa. These cases were reported in France concomitantly with the meningitis epidemic season in Sub-Saharan Africa. Considering the high number of travellers between France and West-African countries belonging to the so-called meningitis belt, the French recommendations for travellers stress the importance of vaccination before travelling to these countries.**

**2010-2011**

- Additional sources for the update
  - the 2010 edition of International Travel and Health (WHO)
  - the 2010 edition of Health Information for International Travel (CDC)
  - The discussion forum of the International Society for Travel Medicine
  - International literature
- The updated 2010-11E-edition of “Medasso”, edited by A. Van Gompel and the staff of the medical service of the Institute for Tropical Medicine Antwerp, is also recommended as a valuable source of information.

[www.who.int/ith](http://www.who.int/ith)

<http://wwwn.cdc.gov/travel/contentYellowBook.aspx>



# The Aedes connection.....



# Officials scramble to contain Phuket dengue 'epidemic'

**Naraporn Tuarob**  
reporter1@classaotmedia.co.th

**P**ublic health officials on Monday (July 1) urged people on Phuket to take better care of themselves in order to avoid contracting dengue fever.

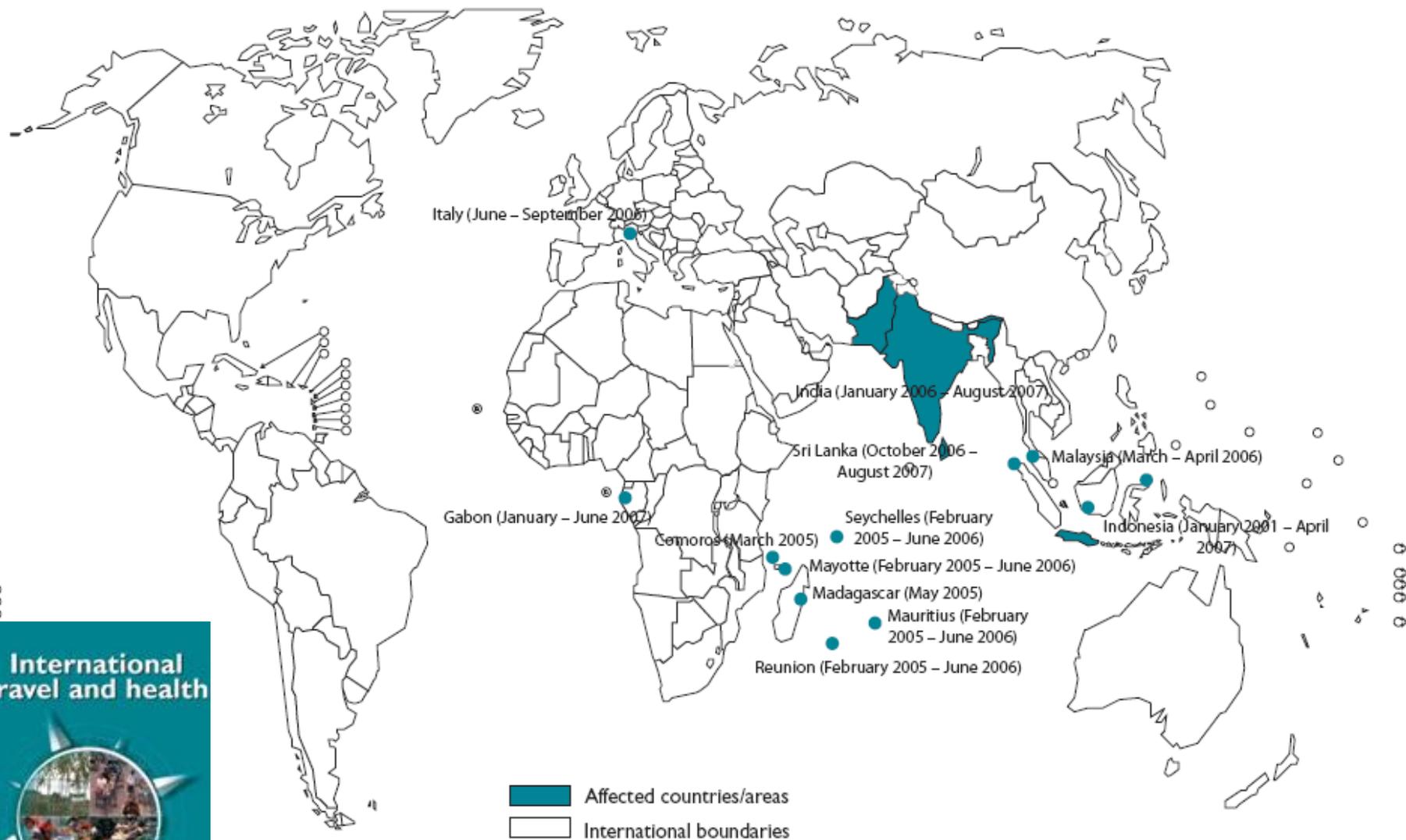
From January 1 until yesterday (June 30) Phuket recorded 1,193 cases of the mosquito-borne disease. Happily, so far there has been only one fatality.

However, the number of infections, not just in Phuket, but nationwide, is particularly high this year. This year's figure for Phuket is roughly double the number in the same period last year.

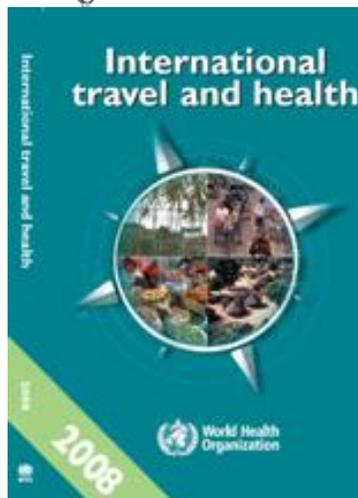


PPHO's Buncha Kakhong: Get your free repellent and use it.

# Chikungunya, 2001–2007



Source: ©WHO, 2008. All rights reserved.



CHIKUNGUNYA (24): THAILAND (PHUKET)

\*\*\*\*\*

A ProMED-mail post

<<http://www.promedmail.org>>

ProMED-mail is a program of the

International Society for Infectious Diseases <<http://www.isid.org>>

Date: Thu 2 Jul 2009

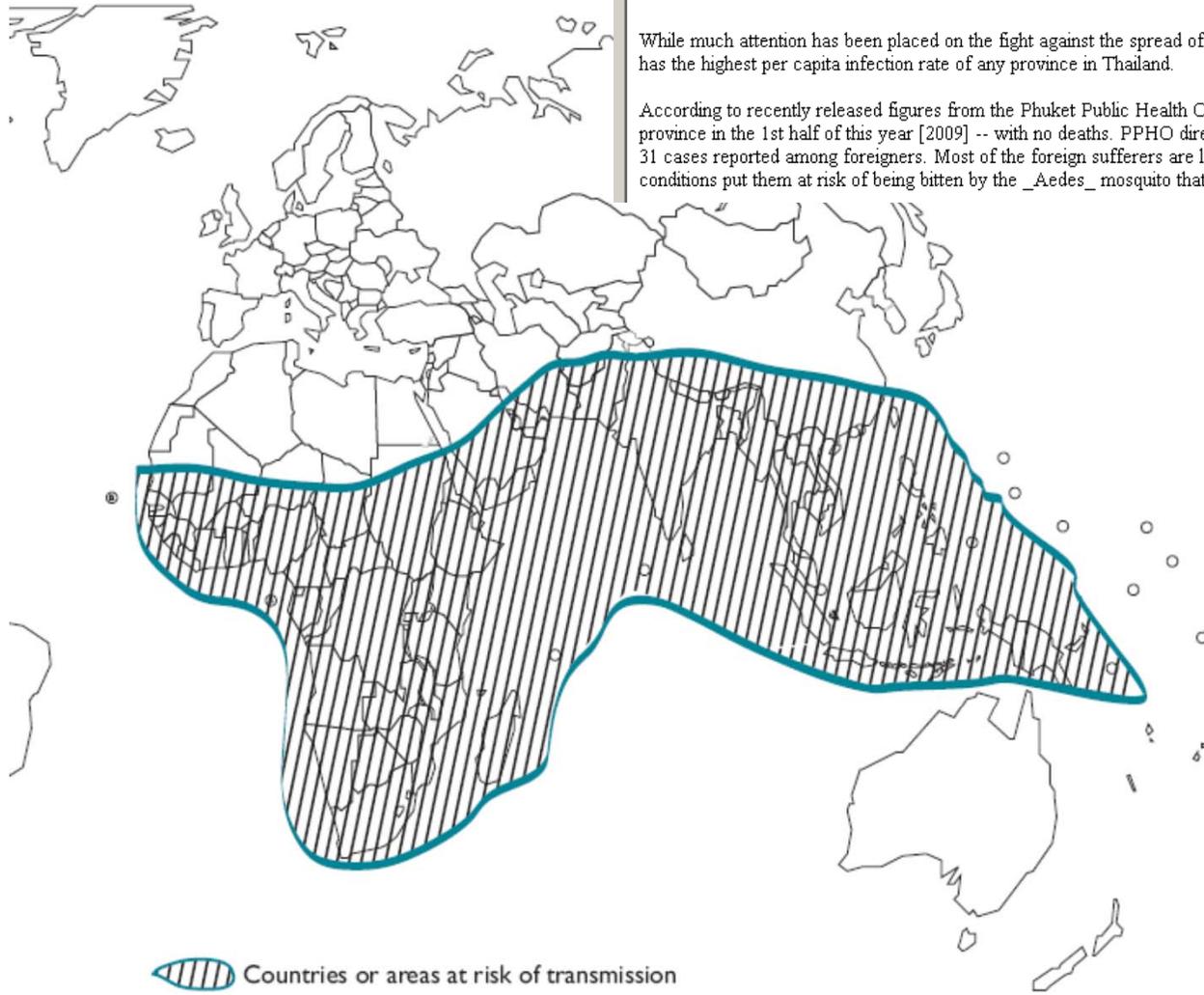
Source: Phuket Gazette [edited]

<<http://www.phuketgazette.net/archives/articles/2009/article7536.html>>

Chikungunya

While much attention has been placed on the fight against the spread of swine flu in Phuket, the island is still suffering from a chikungunya outbreak and has the highest per capita infection rate of any province in Thailand.

According to recently released figures from the Phuket Public Health Office (PPHO), there have been 2155 confirmed cases of the disease in the province in the 1st half of this year [2009] -- with no deaths. PPHO director Dr Pongsawas Ratanasang said 98.6 per cent of the victims were Thai, with 31 cases reported among foreigners. Most of the foreign sufferers are low wage Burmese [Myanmar] laborers, whose work and substandard living conditions put them at risk of being bitten by the *Aedes* mosquito that spreads the virus that causes the disease.



Source: this map has been reproduced with the kind authorization of Lippincott Williams & Wilki David M. Knipe DA et al., eds. *Fields virology*, 5th ed. Vol.1. Philadelphia, Lippincott Williams & Wilkins, 2006:10

### Chikungunya, countries or areas at risk



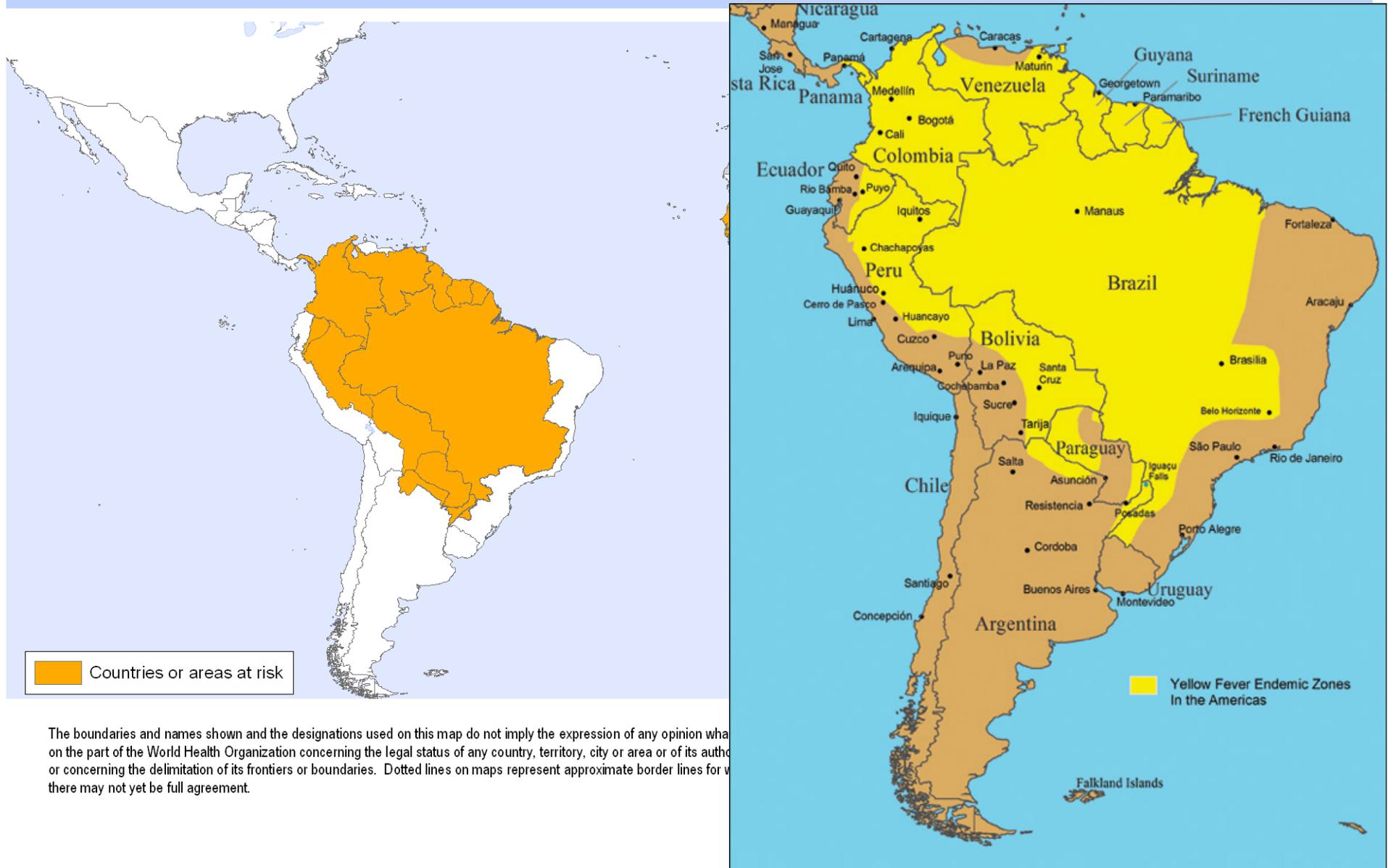
The boundaries and names shown and the designations used on this map do not imply the expression of any opinion whatsoever on the part of the World Health Organization concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries. Dotted and dashed lines on maps represent approximate border lines for which there may not yet be full agreement.

Data Source: World Health Organization  
 Map Production: Health Statistics and Information Systems (HSI)  
 World Health Organization



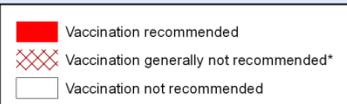
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## Yellow Fever, countries or areas at risk, 2008



The boundaries and names shown and the designations used on this map do not imply the expression of any opinion whatsoever on the part of the World Health Organization concerning the legal status of any country, territory, city or area or of its authority or concerning the delimitation of its frontiers or boundaries. Dotted lines on maps represent approximate border lines for which there may not yet be full agreement.

## Yellow Fever Vaccination Recommendations in the Americas, 2010



\*Yellow Fever (YF) vaccination is generally not recommended in areas where there is low potential for YF virus exposure. However, vaccination might be considered for a small subset of travelers to these areas who are at increased risk for exposure to YFV because of prolonged travel, heavy exposure to mosquitoes, or inability to avoid mosquito bites. Consideration for vaccination of any traveler must take into account the traveler's risk of being infected with YF virus, country entry requirements, and individual risk factors for serious vaccine-associated adverse events (e.g. age, immune status).

## Yellow Fever, countries or areas at risk, 2008



opinion whatsoever  
or of its authorities,  
der lines for which

Data Source: World Health Organization/CDC  
Map Production: Public Health Information  
and Geographic Information Systems (GIS)  
World Health Organization



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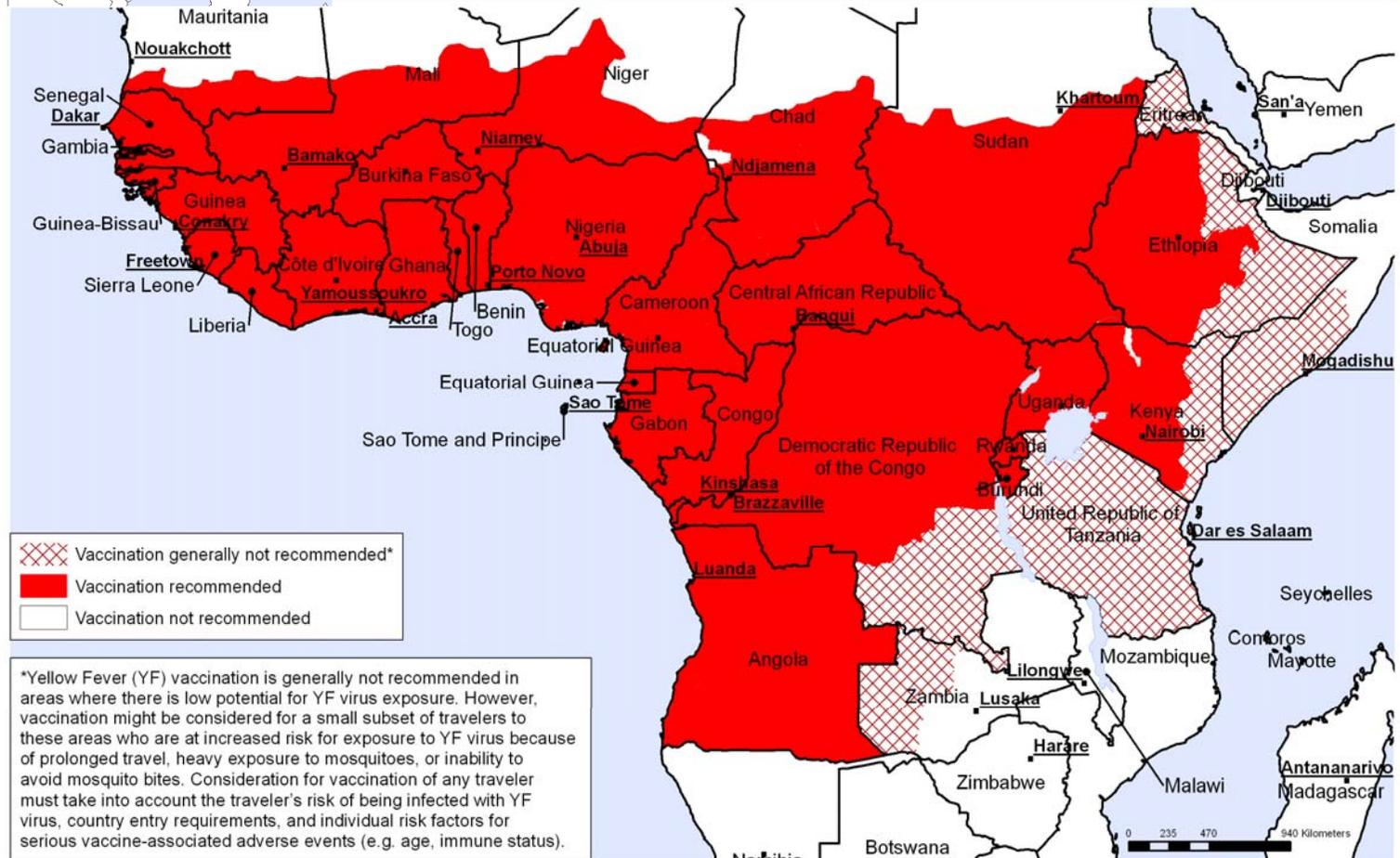


**2010=** “risk of yellow fever virus transmission”

**SHIFT**

**2011 =** “the vaccine recommendations”

**Yellow Fever Vaccination Recommendations in Africa, 2010**



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Eurosurveillance, Volume 17, Issue 21, 24 May 2012

Rapid communications

**W135 INVASIVE MENINGOCOCCAL INFECTIONS IMPORTED FROM SUB-SAHARAN AFRICA TO FRANCE, JANUARY TO APRIL 2012**

I Parent du Châtelet ([i.parent@invs.sante.fr](mailto:i.parent@invs.sante.fr))<sup>1</sup>, P Barboza<sup>1</sup>, M K Taha<sup>2</sup>

1. French Institute for Public Health Surveillance (Institut de veille sanitaire -InVS), Saint-Maurice, France
2. National Reference Center for Meningococci, Institut Pasteur, Paris France

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Citation style for this article: Parent du Châtelet I, Barboza P, Taha MK. W135 invasive meningococcal infections imported from Sub-Saharan Africa to France, January to April 2012. Euro Surveill. 2012;17(21):pii=20181. Available online: <http://www.eurosurveillance.org/ViewArticle.aspx?ArticleId=20181>

Date of submission: 14 May 2012

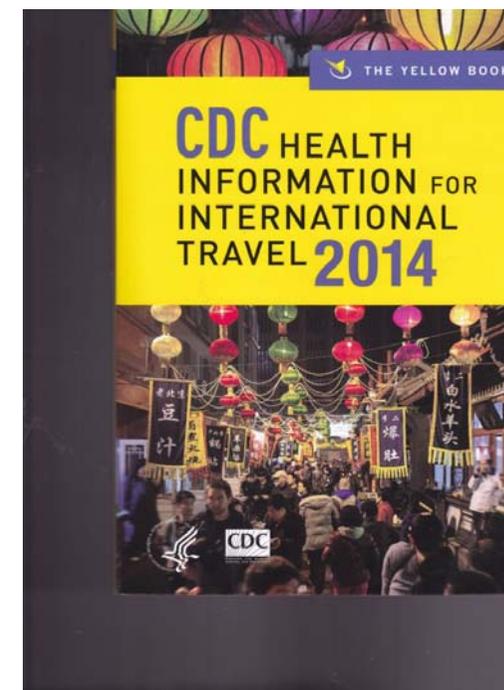
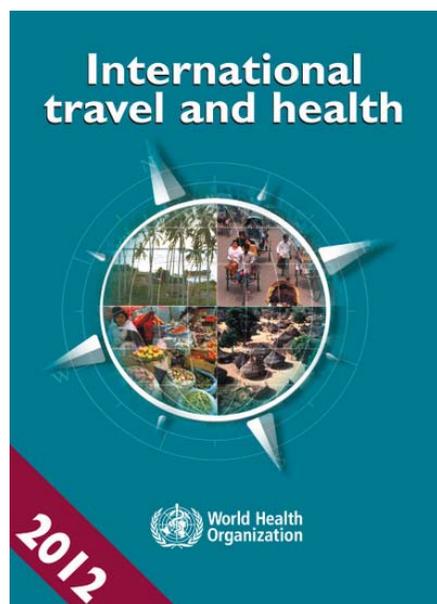
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**From January to April 2012, 16 cases of W135 invasive meningococcal infection were reported in France. Of these, eight were linked to a recent travel history to Sub-Saharan Africa. These cases were reported in France concomitantly with the meningitis epidemic season in Sub-Saharan Africa. Considering the high number of travellers between France and West-African countries belonging to the so-called meningitis belt, the French recommendations for travellers stress the importance of vaccination before travelling to these countries.**

- Additional sources for the update
  - the **2012** edition of International Travel and Health (WHO)
  - the **2014** edition of Health Information for International Travel (CDC)
  - The discussion forum of the International Society for Travel Medicine
  - International literature
- The updated **2012-13**-edition of “Medasso”, edited by A. Van Gompel and the staff of the medical service of the Institute for Tropical Medicine Antwerp, is also recommended as a valuable source of information.

[www.who.int/ith](http://www.who.int/ith)

<http://wwwn.cdc.gov/travel/contentYellowBook.aspx>



WER **17-05-2013** **SAGE**

YELLOW FEVER VACCINATION  
induces LIFELONG  
PROTECTION  
*(see C.Martin talk)*

## International travel and health

### World – Yellow fever vaccination booster

5 JUNE 2014 - Currently, the IHR stipulate that vaccination with an approved yellow fever vaccine provides protection against infection for 10 years, and that the certificate of vaccination or re-vaccination is accordingly valid for 10 years. Requiring the certificate from travellers is at the discretion of each State Party, and it is not currently required by all countries ( see country list, 2014 update: [http://www.who.int/ith/ITH\\_country\\_list.pdf](http://www.who.int/ith/ITH_country_list.pdf))

The WHO World Health Assembly in May 2014 adopted an amendment to Annex 7 of the International Health Regulations (2005) (IHR), which stipulates that the period of protection afforded by yellow fever vaccination, and the term of validity of the certificate will change from 10 years to the duration of the life of the person vaccinated.

This change will enter into force legally in June 2016. Until then the current IHR text on yellow fever vaccination and certificates continues to apply, and some countries may continue to request proof of vaccination or a booster within the last 10 years from travellers.

Starting with the online 2015 ITH edition, WHO will report on the status of yellow fever vaccination requirements for countries.

# cumulative risk assessment – a long tradition in Belgium

To emphasize the lifelong **protection**

- **Polio** (1 booster  $\geq 10$  years after complete basic vaccination series)
- **Hepatitis A** (after complete vaccination series if not immune compromised)
- **Hepatitis B** (if once a titer of 10 IU/ml after complete vaccination series & if not immune compromised)
- **MMR** (after 2 doses)
- **Yellow fever** (cave legal/administrative problems)

To emphasize the lifelong **boostability**

- **Rabies** (after a complete basic series of injections 1-7-21/28)

„,hence it is worth the investment by the traveler „,



Société belge d'infectiologie et de microbiologie clinique  
Belgische vereniging voor infectiologie en klinische microbiologie



Bibliothèque Solvay,  
Parc Léopold  
Rue Belliard 137  
1040 Brussels



**24th OCTOBER 2013**

## Joint Symposium with the Scientific Study Group for Travel Medicine

- 08h00-09h00** Registration
- 09h00 - 09h10** Introduction: **Fons Van Gompel**, President of the Study Group Travel Medicine (ITG, Antwerpen) and **Camelia Rossi**, President SBIMC-BVIKM (CHU Ambroise Paré, Mons)
- 09h10 - 09h30** Voting System: Introduction (**Jan Jacobs**, ITG)

*Preparing your dream trip for next year*

**Chair:** **Frédérique Jacobs** (Hôpital Erasme, Brussels) and **Dirk Vogelaers** (UZ Gent)

- 09h30 - 10h10** All you want to know on rabies in travel medicine (**Patrick Soentjens**, Belgian Army, ITG)
- 10h10 - 10h50** Malaria chemoprophylaxis & WHO maps of the low risk areas in Asia and Latin America (**Fons Van Gompel**, ITG)
- 10h50 - 11h20** *Coffee break*
- 11h20 - 12h00** Pregnant women, babies and infants (**Petra Claes**, European Parliament and **Iris De Schutter**, UZ Brussels)
- 12h00 - 12h30** Epidemiologic flashes & edge cutting news / new vaccines (**Steven Callens**, UZ Gent)
- 12h30 - 14h00** Lunch + Poster session

5 2 1 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20

**Iris De Schutter, UZ Brussels**  
**12h00 - 12h30**      **Epidemiologic flashes & edge cutting news / new vaccines (Steven Callens, UZ Gent)**

**12h30 - 14h00**      **Lunch + Poster session**

*Your dream trip turns sour....*

**Chair: Patrick Lacor (UZ Brussel) and Maya Hites (Hôpital Erasme, Brussels)**

**14h00 - 14h40**      **Fever after a stay in the tropics (Emmanuel Bottieau, ITG)**

**14h40 - 15h20**      **And eosinophilia after a stay in the tropics? (Rembert Mertens, UZ Brussels)**

**15h20 - 15 h50**      *Coffee break*

**15h50 - 16h30**      **Treatment of severe malaria (Jan Clerinx, ITG)**

**16h30 - 17h10**      **Travelling resistant bacteria and viruses (Erica Vlieghe, ITG and Yves Van Laethem, Hôpital Saint-Pierre, Brussels)**

**17h10 - 17h20**      **Conclusion and Poster BVIKM/SBIMC prizes, Camelia Rossi, President SBIMC-BVIKM (CHU Ambroise Paré, Mons) and Fons Van Gompel, President of the Study Group Travel Medecine (ITG, Antwerpen)**

**17h20 - 18h00**      **Award Ceremony of the Sabin prize**

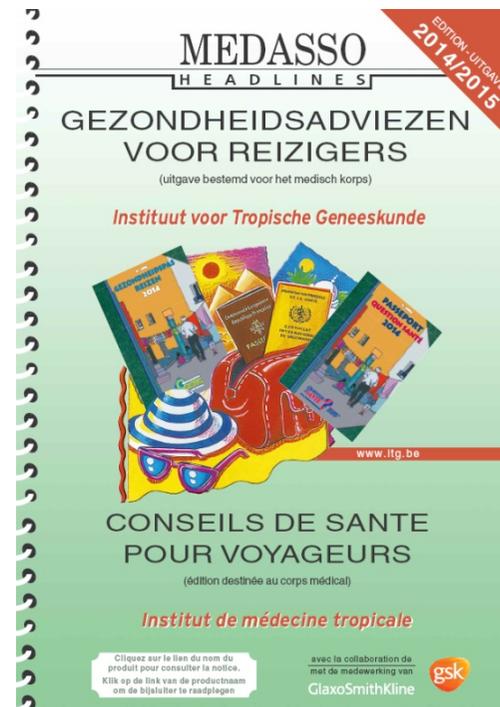
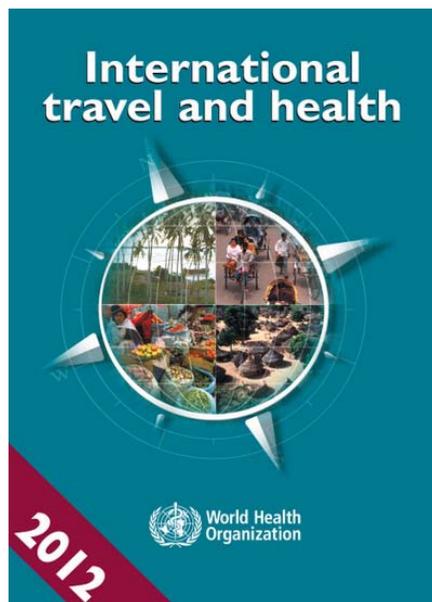
# BELGIAN CONSENSUS MEETING on TRAVEL MEDICINE June 26, 2015

Belgian  
Scientific Study  
Group on Travel  
Medicine

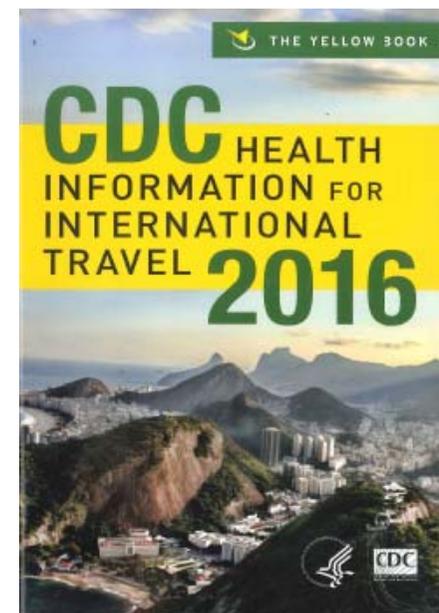
Pr. A. Van Gompel & Dr U Maniewski (ITG)  
Pr. F. Jacobs (Hôp. Erasme, ULB)  
Pr. P. Lacor & Dr L Seyler (UZ-Brussel)  
Dr. Ph. Leonard (CHU-ULg)  
Pr. W. Peetermans (U.Z. - K.U.Leuven)  
Pr. S. Callens(UZ.- U.Gent)  
Dr. S. Quoilin (iph.fgov.be)  
Dr. P. Soentjens (Belgian Defence)  
Pr. B. Vandercam (CHU. St. Luc, UCL)  
Pr. Y. Van Laethem & Dr C Martin (CHU. St.  
Pierre, ULB)

- Sources for the update
  - the international literature
  - the 2015 congress & discussion forum of the ISTM
  - the “**2012 & 15**” edition of International Travel and Health (WHO)
  - the **2016** edition of Health Information for International Travel (CDC)
- The updated **2014-15**-edition of “Medasso”, edited by A. Van Gompel and the staff of the medical service of the Institute for Tropical Medicine Antwerp, is also recommended as a valuable source of information.

[www.who.int/ith](http://www.who.int/ith)



<http://wwwn.cdc.gov/travel/contentYellowBook.aspx>



**Typhoid fever:** from decrease risk  
to « out of stock vaccines »....

# Attack rates of typhoid fever

	Risk / 100'000 travelers			p
	1974-81	1984-87	1993-2002	
S- / SE-Asia	3.3	3.5	3.0	n.s.
W- / Central Africa	6.7	N / A	5.0	n.s.
E-Africa	2.0	N / A	0.9	n.s.
N-Africa	4.0	~ 2.0	1.3	<0.001
Latin America	1.7	N / A	1.6	n.s.
Turkey	6.7	2.0	0.4	<0.001
Italy	0.8	0.15	0.04	<0.001
Spain	0.7	0.14	0.008	<0.001
Steffen R. Lancet 1982;i:615-6 Schottenhaml C. Dissertation Zurich 1990 Keller A et al (in preparation)				100

# Indication for typhoid vaccination

## 2015

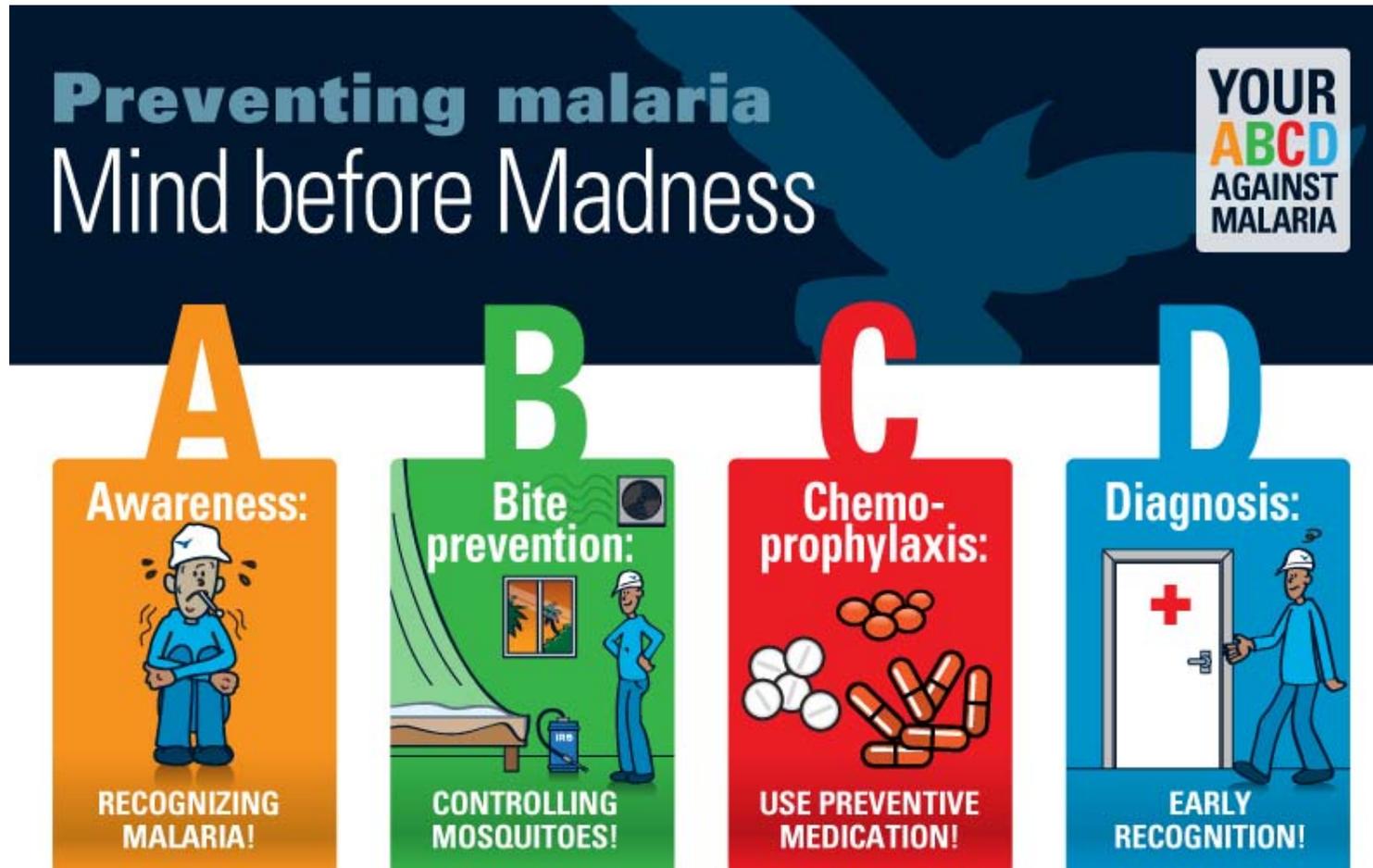
<p>• vaccinatie tegen buiktyfus is <b>vooral aangeraden</b> voor reizen <b>langer dan 3 weken</b> naar <b>het Indisch subcontinent</b>.</p>	<p>• la vaccination contre la fièvre typhoïde est <b>surtout conseillée</b> pour les voyages <b>de plus de trois semaines</b> vers <b>le sous-continent indien</b></p>	<p>vaccination against typhoid fever is <b>particularly advisable</b> for trips <b>longer than 3 weeks</b> duration to the <b>Indian subcontinent</b></p>
<p>• vaccinatie tegen buiktyfus <b>kan overwogen worden</b> voor <b>avontuurlijke</b> reizen in <b>slechte hygiënische omstandigheden</b> in tropische of subtropische landen of voor <b>migranten en hun kinderen die terugkeren naar hun land van herkomst op bezoek bij familie of vrienden</b>.</p>	<p>• la vaccination contre la fièvre typhoïde <b>est à considérer</b> pour les voyages aventureux dans de <b>mauvaises conditions sanitaires</b> vers les pays <b>tropicaux ou subtropicaux</b> ou pour <b>les immigrants et leurs enfants qui retournent dans leur pays tropical d'origine pour visiter la famille et les connaissances</b>.</p>	<p>vaccination against typhoid fever <b>can be considered</b> in case of an adventurous trip in <b>poor sanitary conditions</b> to tropical or subtropical countries or for <b>immigrants when they return to their homeland to visit friends and relatives</b>.</p>



Nothing biting today!



# WHO since 2001 (source UK)



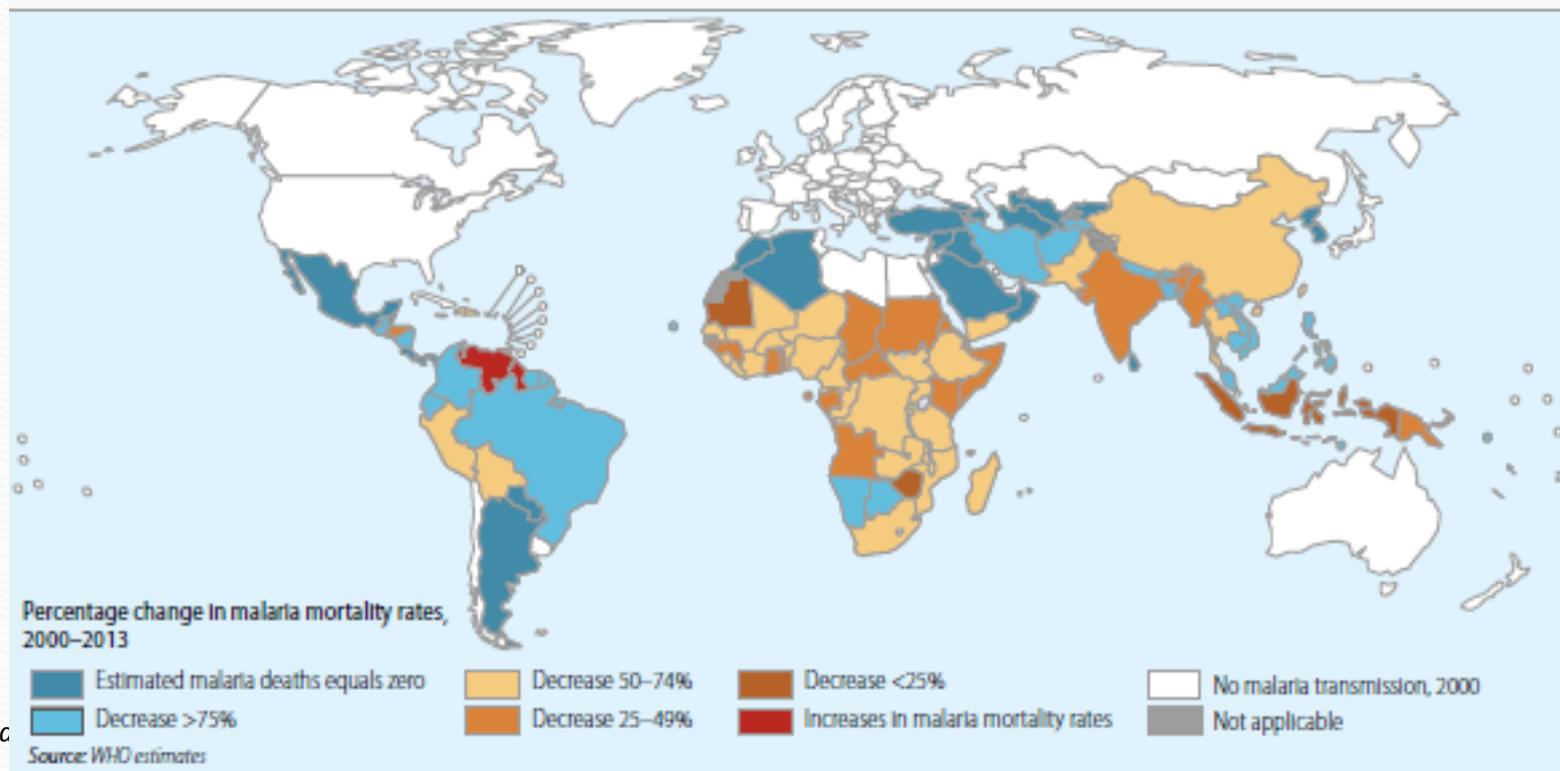
## WHO 2015: + E

Avoid outdoor activities in **E**nvironments that are mosquito breeding places, such as swamps or marshy areas, especially in late evenings and at night.

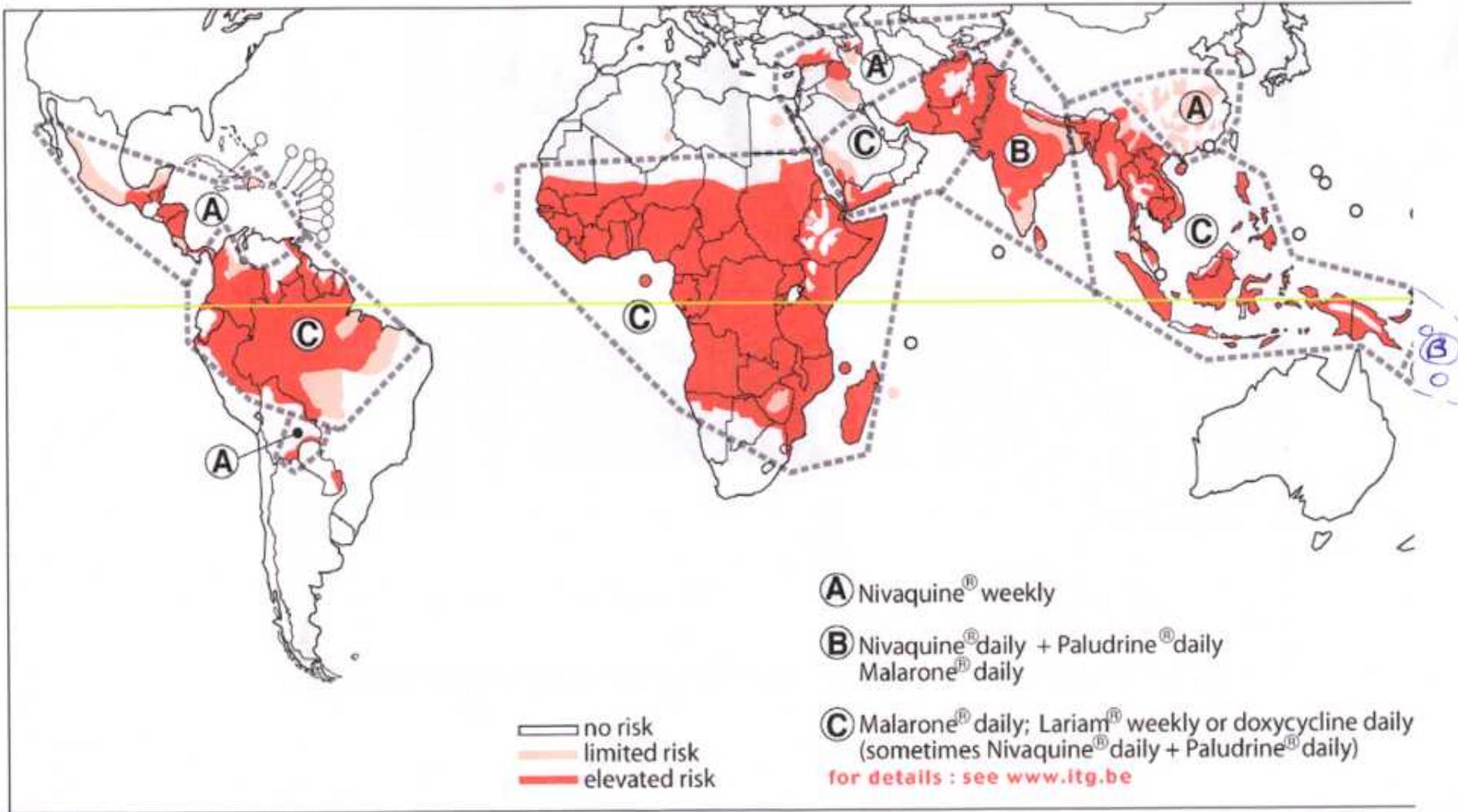
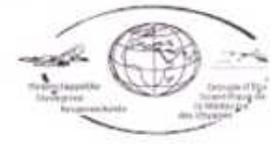
## Grâce à cela....

- Mortalité diminuée de moitié depuis 2000, en grande majorité en Afrique !

Figure 8.9 Percentage change in malaria mortality rates, 2000–2013

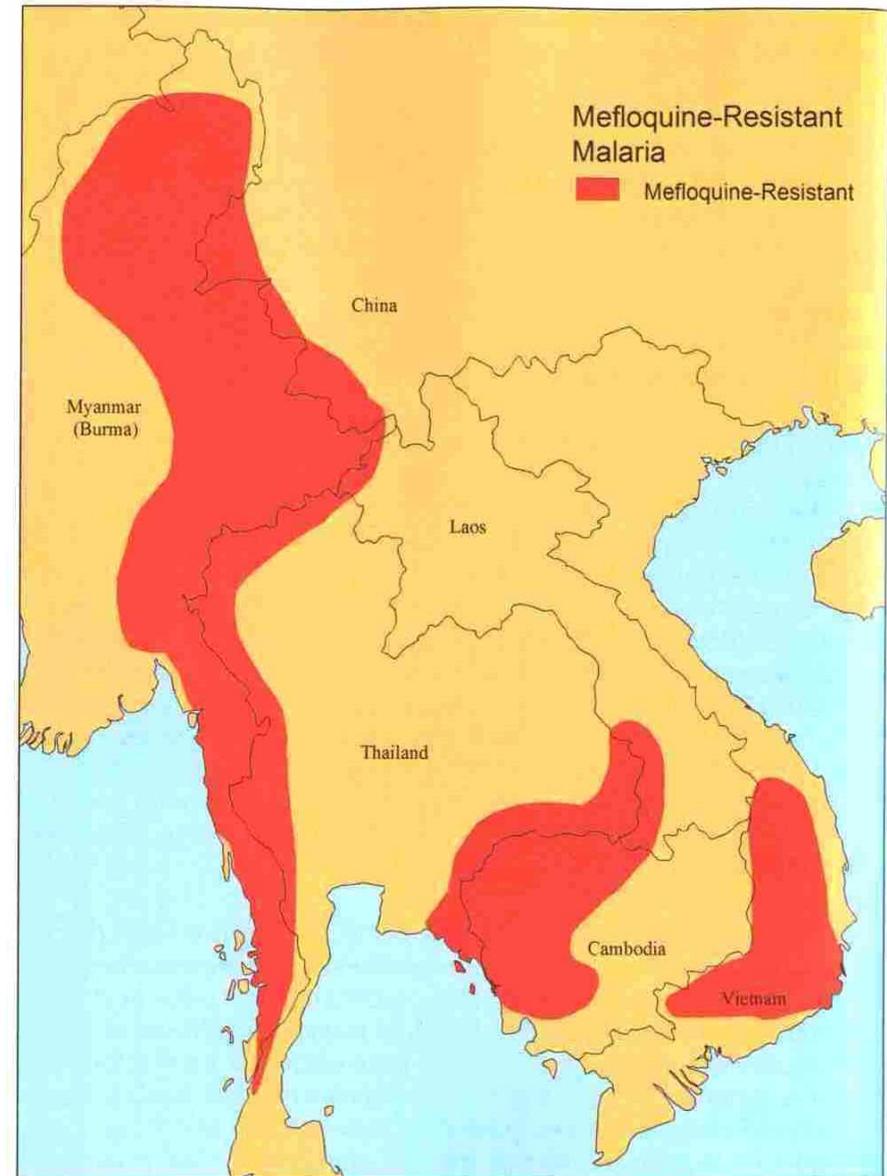


# Malaria 2005 (source WHO 2004-2005)



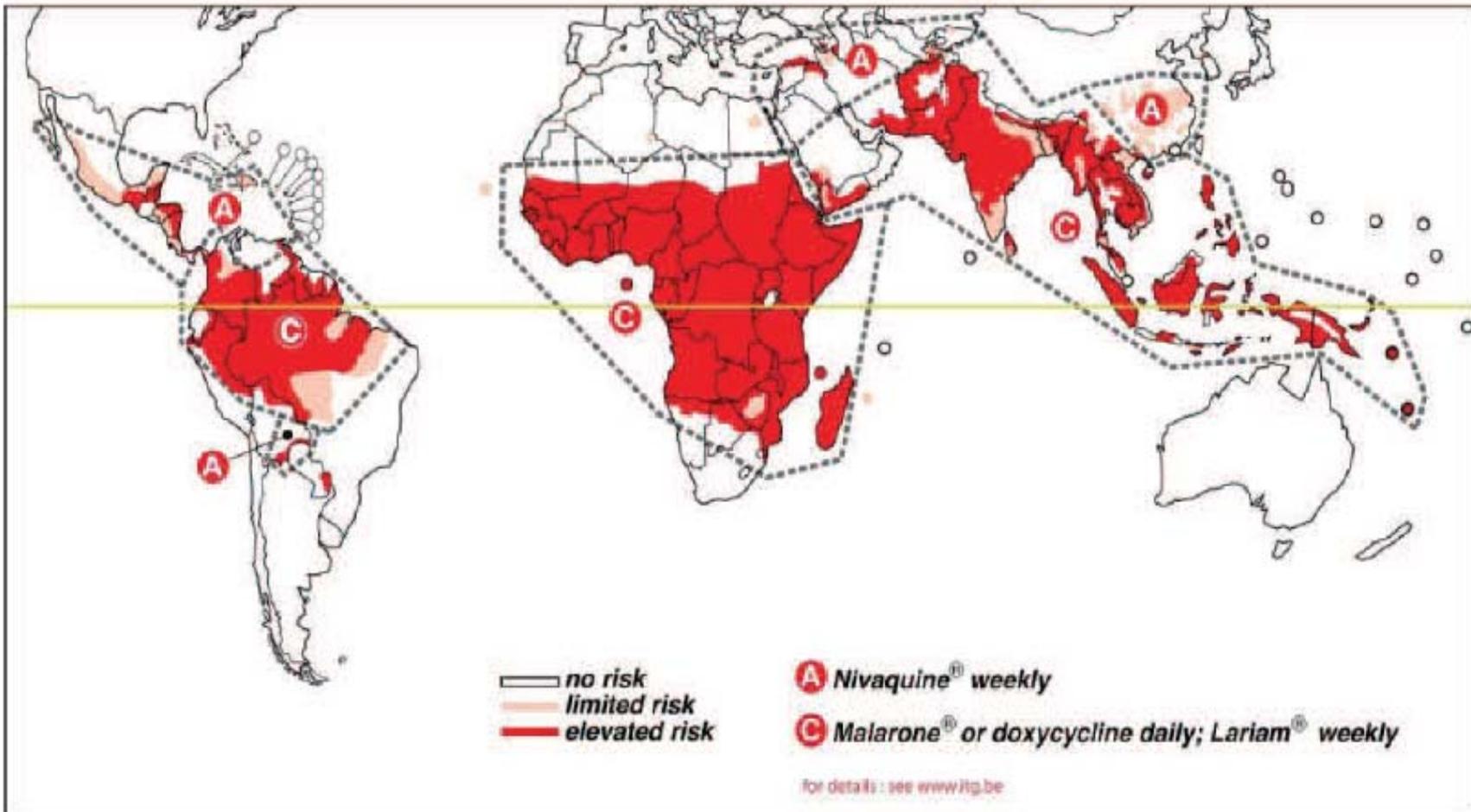
## REMINDER

- The malaria map in de CDC book 2008 shows risk areas for resistance to mefloquine in South-east Asia = Myanmar, Cambodia, Thailand and Vietnam.
- CDC mentions figures of 50% or more resistance, while a WHO map shows the areas with a figure of  $\geq 10\%$ .
- CDC proposes not to use mefloquine in these areas.



MAP 4.9 Geographic distribution of mefloquine-resistant malaria.

# Malaria 2010-2011 (source WHO 2009)



# Roche - Lariam®

Obligatory **patient alert card** to share with the clients



## Lariam® 250mg (mefloquine)

Deze kaart bevat belangrijke informatie voor u over mogelijke psychische bijwerkingen van Lariam.

Lees ook de bijsluiter die u bij dit geneesmiddel ontvangt - daarin staat alle informatie over Lariam.

Draag deze kaart altijd bij u. Laat deze kaart zien aan alle artsen die u raadpleegt.

V. U. Dr. Chr. Linnerts - Br (09) - 10/2013

### Wanneer moet ik mijn arts om advies vragen?

- Altijd: als u bijwerkingen ertoont
- Als u niet zeker weet of u een van de klachten heeft die in de lijst staan vermeld in de rubriek: **Gebruik Lariam niet als...**
- Als u denkt dat u mogelijk een van de psychische bijwerkingen heeft die in volgende rubriek vermeld staan: **Lariam kan bij sommige mensen ernstige psychische problemen veroorzaken...**

### Ik gebruik malariachemoprophylaxe met Lariam (mefloquine).

Naam:

Adres:

Geboortedatum:

Andere geneesmiddelen/  
aandoeningen:

### In geval van nood:

Naam arts:

Telefoonnummer:

Stempel arts:

RMA versie 10/2013



Waarschuingskaart  
voor de patiënt

**Lariam® 250mg**  
(mefloquine)

### Wat moet ik over Lariam weten?

- Lariam is een geneesmiddel dat op recept verkrijgbaar is voor de preventie en behandeling van malaria. Malaria is een mogelijk levensbedreigende infectie. Lariam werkt niet voor alle soorten malaria.
- Zoals uw arts u heeft verteld, moet u Lariam innemen: voordat u op reis gaat, gedurende uw verblijf en na terugkeer uit een malariagebied.
- Gebruik Lariam niet als u psychische problemen heeft of deze ooit heeft gehad, want Lariam kan bij sommige mensen ernstige psychische problemen veroorzaken zoals **zelfmoord, zelfmoordgedachten en gedrag waarbij men zichzelf in gevaar brengt**.

### Gebruik Lariam niet als u last heeft of ooit last heeft gehad van:

- depressie, zelfmoord- gedachten
- andere psychische klachten, zoals angststoornis, schizofrenie of psychose (verlies van contact met de werkelijkheid)
- stuipen (epilepsie of toevallen)
- allergie voor kinine, kinidine of Lariam en zijn hulpstoffen
- ernstige leverklachten
- zwartwaterkoorts (een complicatie van malaria die het bloed en de nieren aantast).

### Gebruik Lariam niet als u op dit moment een geneesmiddel voor malaria gebruikt met de naam:

- Halofantrine.

### Wanneer moet ik mijn arts om advies vragen?

- Als u Lariam gebruikt, is het belangrijk dat u alert bent op mogelijke bijwerkingen. Neuro-psychiatrische problemen kunnen optreden tijdens het gebruik van Lariam.
- Gebruik Lariam niet als u kans loopt om dergelijke bijwerkingen te ontwikkelen (zie **'Gebruik Lariam niet als...'**)

### Lariam kan bij sommige mensen ernstige psychische problemen veroorzaken. Vertel het direct aan uw arts als u last heeft van één (of meerdere) van onderstaande bijwerkingen tijdens het gebruik van Lariam:

- Zelfmoord-gedachten,
- gedrag waarbij men zichzelf in gevaar brengt,
- ernstige angstgevoelens,
- gevoelens van wantrouwen ten opzichte van anderen,
- dingen zien of horen die er niet zijn,
- depressie,
- rusteloosheid,
- ongewoon gedrag
- gevoel van verwardheid

### Contacteer onmiddellijk uw arts.

Het gebruik van Lariam moet onmiddellijk worden stopgezet en vervangen door een ander middel ter preventie van malaria.

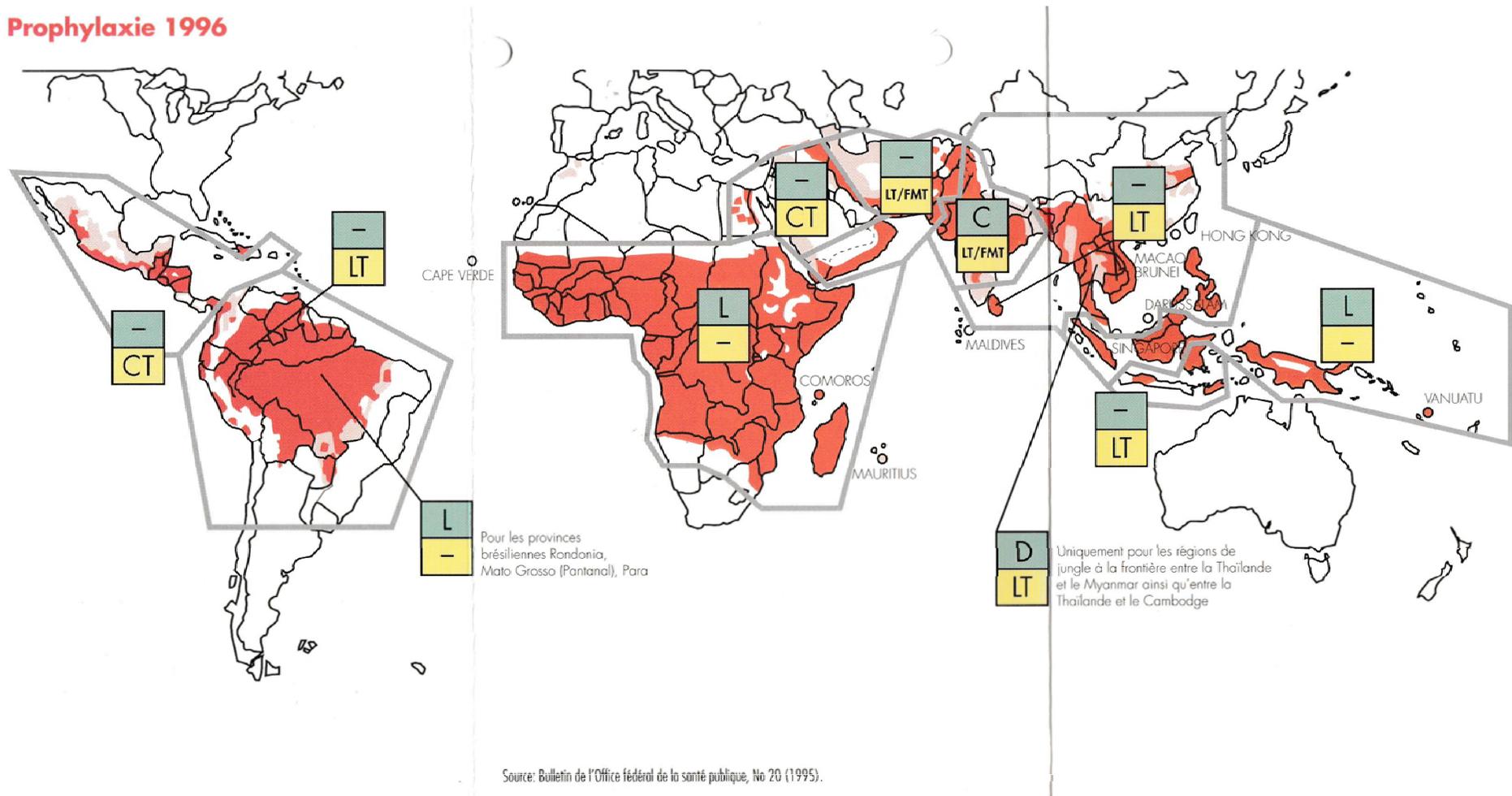
### Andere bijwerkingen van Lariam kunnen zijn:

Stuipen (epilepsie of toevallen), leverklachten, hartklachten, misselijkheid, overgeven, diarree, buikpijn, duizeligheid of evenwichtsverlies (vertigo), hoofdpijn, slaapproblemen (slaperigheid, niet kunnen slapen, nare dromen).

### Hoe gebruikt u Lariam:

- Neem de tabletten eenmaal per week in, altijd op dezelfde dag.
- Neem de 1e dosis Lariam ten minste 10 dagen voor uw vertrek: dit is nodig om er zeker van te zijn dat toediening van Lariam goed wordt verdragen
- Neem de 2e dosis 3 dagen voor vertrek in.
- Tijdens uw verblijf en gedurende 4 weken na terugkomst moet u doorgaan met het innemen van de tabletten.

# Prophylaxie 1996



Prophylaxie  
Traitement d'urgence

L LARIAM® en prophylaxie  
-

- Zones dans lesquelles le paludisme n'a jamais sévi ou d'où il a disparu
- Zones à risque très limité; transmission du paludisme très rarement possible
- Zones à transmission du paludisme

Avis: les recommandations nationales concernant la prophylaxie et le traitement d'urgence sont publiées mensuellement dans le Bulletin de l'Office fédéral de la santé publique.