

June 2010

Report from WHO Annual Meeting on Buruli ulcer



22–24 March 2010 | Geneva

The WHO recently released the meeting report, which is available in [English](#) and [French](#), of its annual Buruli ulcer meeting in Geneva.

[Read more](#) about WHO activities and publications including a [recent report on wound management](#).

Research News –Treatments

Antimicrobial treatment for early, limited *Mycobacterium ulcerans* infection: a randomised controlled trial

Nienhuis WA, Stienstra Y, Thompson WA, Awuah PC, Abass KM, Tuah W, Awua-Boateng NY, Ampadu EO, Siegmund V, Schouten JP, Adjei O, Bretzel G, van der Werf TS.

The authors report on a randomised controlled trial comparing antimycobacterial treatment for *M ulcerans* infection, which is effective in early, limited disease. Four weeks of streptomycin and rifampicin followed by 4 weeks of rifampicin and clarithromycin has similar efficacy to 8 weeks of streptomycin and rifampicin; the number of injections of streptomycin can be reduced by switching to oral clarithromycin after 4 weeks.

Lancet Research Article, published 20 Feb 2010 | PMID: 20137805 | [Read more](#)

Should antibiotics be given for Buruli ulcer?

Johnson PD

A comment on the above study in which the author mentions that while the finding of equivalence between two quite similar regimens might seem unremarkable, this important study will change clinical practice.

Lancet Comment, published 20 Feb 2010 | PMID: 20137806 | [Read more](#)

Antimicrobial drugs for Buruli ulcer.

Billal DS. *Lancet*. 2010 May 29;375(9729):1873; author reply 1873-4. No abstract available. PMID: 20511015. [Read more](#)

Research News – Transmission

Risk factors for *Mycobacterium ulcerans* infection

Jacobsen KH, Padgett JJ

This systematic literature search found that poor wound care, failure to wear protective clothing, and proximity to water bodies were commonly identified risk factors. Socioeconomic status, BCG vaccination, and direct water contact were not associated with significantly increased or decreased risk of infection.

Int J Infect Dis Review, published 23 Feb 2010 | PMID: 20185351 | [Read more](#)

Research News – Transmission (continued)

Mycolactone gene expression is controlled by strong SigA-like promoters with utility in studies of *Mycobacterium ulcerans* and Buruli ulcer

Tobias NJ, Seemann T, Pidot SJ, Porter JL, Marsollier L, Marion E, Letournel F, Zakir T, Azuolas J, Wallace JR, Hong H, Davies JK, Howden BP, Johnson PD, Jenkin GA, Stinear TP

The authors provide the first report to identify *M. ulcerans* toxin gene promoters, and they have used their findings to develop *M. ulcerans*-GFP, a strain in which fluorescence and toxin gene expression are linked, thus providing a tool for studying Buruli ulcer pathogenesis and potential transmission to humans.

PLoS NTD Research Article, published 23 Feb 2010 | doi:10.1371/journal.pntd.0000553 | [Read free article](#)

Genomic diversity and evolution of *Mycobacterium ulcerans* revealed by next-generation sequencing

Qi W, Käser M, Röltgen K, Yeboah-Manu D, Pluschke G

Results published here provide significant insight into the evolution of *M. ulcerans* and provide a comprehensive report on genetic diversity within a highly clonal *M. ulcerans* population from a Buruli ulcer endemic region, which can facilitate further epidemiological studies of this pathogen through the development of high-resolution tools.

PLoS Pathogens Research Article, published 11 Sept 2009 | doi:10.1371/journal.ppat.1000580 | [Read free article](#)

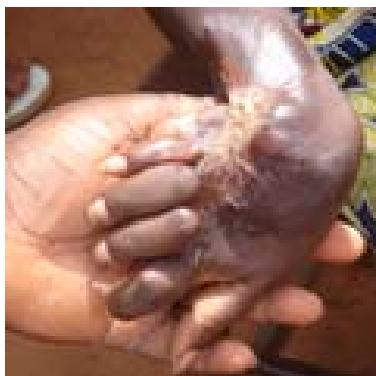
Under treated necrotizing fasciitis masquerading as ulcerated edematous *Mycobacterium ulcerans* infection (Buruli ulcer)

Phanzu MD, Bafende AE, Imposo BB, Meyers WM, Portaels F

A case of under treated necrotizing fasciitis (NF) in a 65-year-old woman with diabetes misdiagnosed as *Mycobacterium ulcerans* infection is reported. This patient shows the difficulties that may be encountered even in known endemic areas in recognizing BU cases purely on clinical findings.

Am J Trop Med Hyg Brief Report, published Mar 2010 | doi:10.4269/ajtmh.2010.09-0256 | [Read more](#)

Research News – Sociocultural aspects



A word of caution against the stigma trend in neglected tropical diseases NTD research and control

Muela Ribera J, Peeters Grietens K, Toomer E, Hausmann-Muela S

As with many other NTDs, the scar of Buruli ulcer extends beyond physical manifestations and social stigma. The authors argue that it is critically important to contextualize stigma within a broader conceptual framework of health-seeking behavior and other socioeconomic factors.

PLoS NTD, 27 Oct 2009 | doi:10.1371/journal.pntd.0000445 | [Read free article](#)

Research News – Diagnosis

Laboratory diagnosis of Buruli ulcer disease

Beissner M, Herbinger KH, Bretzel G

The authors review currently available diagnostic techniques for Buruli ulcer disease (BUD). Laboratory confirmation of clinically suspected cases remains crucial for clinical management of BUD. Due to the extended presence of mycobacterial DNA under antimycobacterial treatment, PCR is not suitable for monitoring of treatment success. Currently, cultures are considered the only valid confirmatory test for the detection of viable bacilli.

Future Medicine Special Report, published Mar 2010 | doi:10.2217/fmb.10.3 | [Read more](#)

Application of real-time PCR in Ghana, a Buruli ulcer-endemic country, confirms the presence of *Mycobacterium ulcerans* in the environment

Vandelannoote K, Durnez L, Amissah D, Gryseels S, Dodoo A, Yeboah S, Addo P, Eddyani M, Leirs H, Ablordey A, Portaels F

This study reports the first successful application of real-time PCR for the detection of *Mycobacterium ulcerans*, the causative agent of Buruli ulcer (BU), in Ghana, a BU-endemic country. Environmental samples and organs of small mammals were analyzed. The real-time PCR assays confirmed the presence of *M. ulcerans* in a water sample collected in a BU-endemic village in the Ashanti Region.

FEMS Microbiol Research Letter, published Mar 2010 | doi: 10.1111/j.1574-6968.2010.01902.x | [Read more](#)

Stop Buruli News

Sustaining collaboration at 2nd annual Stop Buruli meeting

21 Mar 2010 | Geneva

At the second annual meeting of the Stop Buruli initiative, the annual coordinated research plan was adapted for emerging needs and opportunities. Dr. Alphonse Um Boock, member of the consortium from Cameroon, stressed in his presentation, "*Stop Buruli has improved how the disease is dealt with...Now we must strive to keep these changes sustainable in order to guarantee the quality of the control of the disease in Cameroon and in other countries where Stop Buruli is active. The results of the social science studies could be crucial for this.*" [Read more](#)

Other News – Advocacy

White House Called On To Expand Global Health Initiative

25 Feb 2010 | New York

The Obama administration's Global Health Initiative (GHI) does not go far enough in combating the most lethal neglected tropical diseases, according to the international medical humanitarian organization Doctors Without Borders/Médecins Sans Frontières (MSF) and the Drugs for Neglected Diseases initiative. The diseases left out of the GHI are some of the deadliest and most forgotten, including Buruli ulcer.

[Read more](#)

Report on Funding for Neglected Disease R&D

Dec 2009 | Sydney

The George Institute's G-FINDER project has published its latest report on investments made globally into research and development addressing the infectious diseases of poverty – the survey includes 31 infectious diseases including NTDs like Buruli ulcer. Increases in the global budget seem to have stalled and expenditure on individual infections is still not in proportion to the burden of disease they cause.

[Report available for download.](#)

Up-To-Date PubMed References on Buruli ulcer

See [up-to-date PubMed citations](#) referencing the terms "mycobacterium ulcerans" or Buruli".

How to access articles referenced in this list? HINARI

In the Buruli Beat news digest, links to the articles on journal websites are provided by clicking on the blue highlighted, underlined text. In cases where articles have been made freely available through open-access publishers like PLoS, click on 'read free article'. However, many articles still require a paid subscription service to see the full article rather than just the abstract.

For researchers in developing countries, the HINARI Programme set up by WHO together with major publishers, enables developing countries to gain access to one of the world's largest collections of biomedical and health literature. More than 7,000 journal titles are now available to health institutions in 109 countries, areas and territories benefiting many thousands of health workers and researchers, and in turn, contributing to improved world health. Go to the [HINARI web page](#) to learn about how to subscribe.

Research articles available in languages other than English

[Buruli ulcer re-emergent infection]

Adou L. Bacteriol Virusol Parazitol Epidemiol. 2009 Apr-Jun;54(2):125-33. PMID: 20422927. **Romanian.** [Read more](#)

[Buruli ulcer or Mycobacterium ulcerans infection]

Abgueguen P, Pichard E, Aubry J. Med Mal Infect. 2010 Feb;40(2):60-9. PMID: 19796893. **Spanish.** [Read more](#)

[Cutaneous and soft skin infections due to non-tuberculous mycobacteria]

Alcaide F, Esteban J. Enferm Infecc Microbiol Clin. 2010 Jan;28 Suppl 1:46-50. PMID: 20172423. **Spanish.** [Read free article](#)

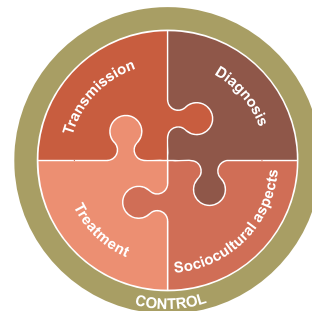
[Implementation of in vitro culture of Mycobacterium ulcerans from clinical samples versus detection of acid-fast bacilli and bacterial genome in Abidjan, Côte d'Ivoire.]

Coulibaly B, Coulibaly-N'golo MD, Ekaza E, Aka N, N'guessan KR, Baudryard A, Assandé JM, Trébissou N, Guédé-Guina F, Dosso M. Bull Soc Pathol Exot. 2009 Dec 14. PMID: 20084485. **French.** [Read more](#)

Next Buruli Beat Digest – August 2010

Make sure to [subscribe](#) at the Stop Buruli website to ensure we have your updated email address.

Buruli Beat is a bimonthly news digest which brings together Buruli-related news and journal articles. Buruli Beat is provided by Stop Buruli, a transdisciplinary research consortium bundling Buruli ulcer research so as to best address the needs of patients suffering from one of the most neglected diseases. Made up of eight leading research teams from Australia, Belgium, Benin, Cameroon, Ghana, Switzerland, and the US, Stop Buruli conducts research along four main axes: diagnosis, transmission, treatment and socio-cultural/economic aspects. Learn more at www.stopburuli.org, where you can find regular news updates on the consortium, background information, and the subscription page for Buruli Beat.



Stop Buruli is initiated and supported by the UBS Optimus Foundation.