

Global health landmark: The genome of *Aedes aegypti* ^[1]

Submitted by [Marcos Lopez](#) ^[2] on 1 July 2007 - 12:00am



^[3]

Aedes aegypti, dengue vector

Aedes aegypti is the mosquito that transmits the flavivirus that causes dengue, a disease that afflicts about 100 million people annually. *Aedes aegypti* is also the vector for yellow fever and chikungunya virus.

Last month Nene *et al* published the complete genome sequence of *Aedes aegypti* in *Science*. This work will now allows researchers to develop sound strategies that prevent vector competence. For instance, this study will allow the identification of new genes and proteins that control the transmission of the pathogen, the mosquito resistance to insecticides and the mosquito behaviors that give rise to the transmission of the disease. The identification of those genes will then allow scientists to develop targeted drugs.

These are great news for global public health, particularly in Puerto Rico, where dengue is not only an epidemic disease, but has also been in the rise lately ^[4]. Puerto Rico has contributed to our understanding of dengue epidemiology, thanks in part to the work of people like [Dr. Jose](#)

Rigau [5]. Dr. Rigau worked at the Dengue branch of the Centers for Disease Control (CDC) in Puerto Rico. Dr. Rigau, an active member of CienciaPR, is now retired and works compiling the scientific history of Puerto Rico and wrote our Puerto Rican scientific history section [6].

The new genomic sequence of *Aedes aegypti* will allow the CDC scientists working in Puerto Rico to develop new experimental strategies to understand and control the biological cycle of this deadly vector.

Tags:

- Jose Rigau [7]
- Aedes aegypti [8]
- dengue [9]
- CDC [10]

Categorías de Contenido:

- Biological and health sciences [11]

Source URL: <https://www.cienciapr.org/en/monthly-story/global-health-landmark-genome-aedes-aegypti?language=en&page=3>

Links

[1] <https://www.cienciapr.org/en/monthly-story/global-health-landmark-genome-aedes-aegypti?language=en>
[2] <https://www.cienciapr.org/en/user/marco4357?language=en> [3]
<https://www.cienciapr.org/sites/cienciapr.org/files/field/image/covermed.jpg> [4]
https://www.cienciapr.org/news_view.php?id=678 [5] <https://www.cienciapr.org/en/user/jgrigau?language=en>
[6] <https://www.cienciapr.org/history> [7] <https://www.cienciapr.org/en/tags/jose-rigau?language=en> [8]
<https://www.cienciapr.org/en/tags/aedes-aegypti?language=en> [9]
<https://www.cienciapr.org/en/tags/dengue?language=en> [10]
<https://www.cienciapr.org/en/tags/cdc?language=en> [11] <https://www.cienciapr.org/en/categorias-de-contenido/biological-and-health-sciences-0?language=en>