



# BAT 1K NEWSLETTER



Photo: Dave Hemprich- Bennett

## In this Newsletter:

1. Bat1K pilot study completed
2. JoVE protocol video
3. Happy Holidays!

Dear Bat1K Members,

Welcome to our 5<sup>th</sup> Bat1K Newsletter! In this edition of our quarterly Newsletter we have some announcements! We are very happy to let you know that Bat1K has two new papers, including the pilot study. In addition, we added more valuable content to our member's area. Read below for more details – we hope you will enjoy it.

### 1. Bat1K pilot study completed and online @BioRxiv

Bat1K finishes 2019 with the release of its pilot study – the first six reference-quality bat genomes representing key divergent bat lineages.

The paper shows the development of sequencing and assembly techniques, a TOGA annotation pipeline, and the generation of near-complete, chromosome level genomes. We also describe what we have learned about bat biology and evolution from these exquisite genomes to provide evolutionary insights into the extraordinary traits of bats.

To learn more, you can read the whole preprint at bioRxiv, via this link: [here](#). Moreover, the genome assemblies are available on the Bat1k [genome browser](#).

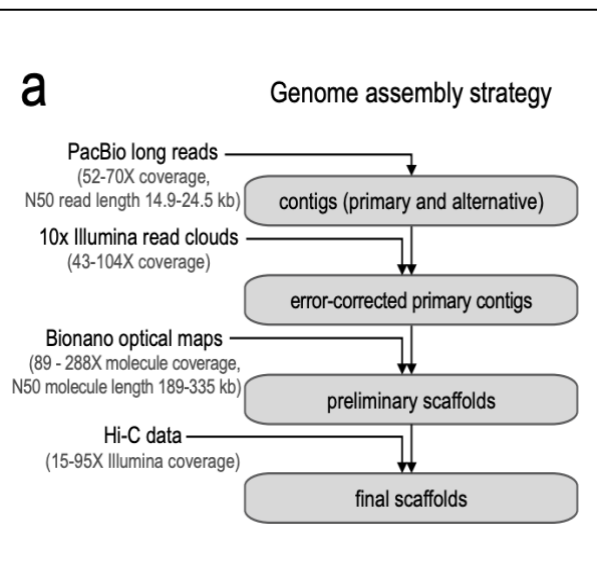
Now, Bat1K is officially moved into phase I with the goal to sequence representatives from each of the 21 bat families. Since we have funding for this phase, please let us know if you are able to pledge samples – especially from rare or hard to get bat families and species.

## Six new reference-quality bat genomes illuminate the molecular basis and evolution of bat adaptations

David Jebb, Zixia Huang, Martin Pippel, Graham M. Hughes, Ksenia Lavrichenko, Paolo Devanna, Sylke Winkler, Lars S. Jermiin, Emilia C. Skirmuntt, Aris Katzourakis, Lucy Burkitt-Gray, David A. Ray, Kevin A. M. Sullivan, Juliana G. Roscito, Bogdan M. Kirilenko, Liliana M. Dávalos, Angelique P. Corthals, Megan L. Power, Gareth Jones, Roger D. Ransome, Dina Dechmann, Andrea G. Locatelli, Sebastien J. Puechmaille, Olivier Fedrigo, Erich D. Jarvis, Mark S. Springer, Michael Hiller,  Sonja C. Vernes, Eugene W. Myers, Emma C. Teeling

doi: <https://doi.org/10.1101/836874>

**bioRxiv**  
THE PREPRINT SERVER FOR BIOLOGY



Genome assembly strategy for 6 new reference quality genomes from Bat1K



## 2. Updated protocol section in members area of Bat1k.com featuring new JoVE paper and video

In our members area on [Bat1K.com](http://Bat1K.com), we now provide you with new material and resources.

We uploaded a new protocol video in which members of Bat1K demonstrate the optimal tissue preparation for genomic, transcriptomic and proteomic analyses of bats caught in the wild. We also show you in this video how primary cells can be cultured from bat wing clips.

In the members section you can find the corresponding JoVE paper by Yohe et al. (2019), in which you find all relevant information with regard to Bat1K standards in bat capture, dissection, tissue preservation and cell culturing. This paper and video are made open access only to Bat1K members, so if you haven't signed up yet, do it today! It takes only a few minutes to complete the web form [here](#) and it means you will have access to all our resources and genome updates.

We are creating these genomes to share with the bat community, so if you want access to any data, including genomes that are not yet released, if you want to propose a collaboration with Bat1k members, or if you want to connect with members who have shared goals, we encourage you to fill out an access request form [here](#). You can of course always contact us on [bat1kconsortium@gmail.com](mailto:bat1kconsortium@gmail.com) with any queries.

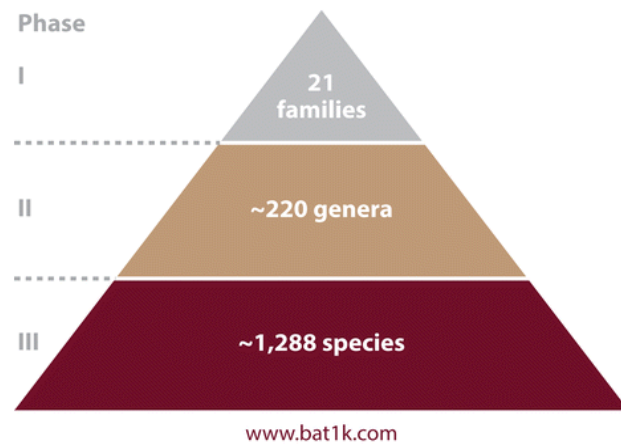
### And last but not least...we wish you a wonderful holiday season

*The year is ending and Bat1K is looking back at 2019, proud and happy at the progress that has been made.*

*These achievements were only possible through the efforts of lots of people and laboratories around the world. We want to express our huge thanks to the community. May the next year be as productive and successful!*

*We wish you a wonderful holiday season and a happy New Year 2020*

*-The Bat1K directors & steering committee*



Teeling EC, et al. 2018. *Annu. Rev. Anim. Biosci.* 6:23–46



The JoVE protocol video is exclusively open access for our Bat1K members within the member area. **Click on the photo above** to stream the video, which is embedded on our website.



Wishing you a very batty holiday season and a happy new year!

Photo source: [Bats QLD](#)