

Multiparental Populations: A Call for Papers

In 1916, Edward East published a groundbreaking paper in *GENETICS* demonstrating that quantitative variation can be explained in part by variation at Mendelian “factors.” A century later, efficient mapping of complex traits at high resolution is fueled by the use of populations initiated with multiple founders, increasing power and resolution. Multiparental populations (MPPs) have become indispensable for both basic and applied genetics research over the past decade. MPPs include the *Drosophila* Synthetic Reference Population, the *Arabidopsis* Multiparent Advanced Generation InterCross (MAGIC) population, and the Collaborative Cross mice, as well as diversity panels such as Diversity Outbred mice and association panels. But, as always, inherent trade-offs in these methods have spurred much discussion of experimental design and analysis, as well as of the intricacies of technology and its application in the real world.

In 2014, the Genetics Society of America (GSA) Journals *GENETICS* and *G3: Genes|Genomes|Genetics* responded to strong community interest by launching the ongoing series on *Multiparental Populations*. The series seeks to encourage innovation and discussion within a rapidly developing research landscape. It serves as a peer-edited, community-driven forum for scholarly discussion of new advances and challenges. The series features articles reporting the insights yielded by empirical studies of MPPs, as well as the methodological advances needed to make best use of these new and analytically complex tools. To ensure maximum longevity and benefit to the field, all articles include detailed methods sections, and provide access to all the associated data. We look for your thoughts and contributions in this important area.

The GSA Journals are creating a new, easy-to-browse interface for the MPP series to allow you to more easily discover relevant articles. As part of launching the new platform, we are seeking submissions of new MPP manuscripts. Published articles will be promoted in the cross-journal collection, ensuring greater exposure to prominent researchers working with MPPs, and to the wider readership of *GENETICS* and *G3*. Examples of GSA promotional platforms include: e-News and targeted E-mail announcements to all GSA members, social media, conference material, and our widely read *Genes to Genomes* blog.

Explore previous articles in the series at: <http://www.genetics.org/content/multiparental-populations>.

WHAT TYPES OF MANUSCRIPTS ARE SUITABLE FOR THE MPP SERIES?

We seek manuscripts focused on multiparent approaches to mapping describing either experimental or theoretical research. Examples of appropriate research include: development of new methods and analytical approaches relevant to MPPs, development of new MPP resources, and the results of mapping experiments performed using MPPs. We particularly welcome new MPP populations.

Note that MPP is defined as any population where alleles are shared among members of the population, and where there are more than two ancestral alleles at many loci.

HOW SHOULD I SUBMIT MY MANUSCRIPT?

By October 30, 2016, please E-mail an abstract of your research to the *GENETICS* editorial office: genetics-gsa@thegsajournals.org. Use “MPP Series Abstract _ Last Name” as your subject line. Further submission instructions will be provided after a brief editorial review.

IF ACCEPTED, WHICH JOURNAL (GENETICS OR G3) WILL MY MANUSCRIPT BE PUBLISHED IN?

Based on your abstract, the editors may make a prereview recommendation on which journal’s scope best fits your research. However, it is possible the editors may revise their recommendation after peer review. For example, they may decide, based on reviews, that your manuscript does not fit the scope of *GENETICS*, but is ideal for publication in *G3*. To be accepted, manuscripts must meet the regular criteria for publication in the GSA journals; thematic relevance alone will not be sufficient to justify publication in the MPP series.

WHEN IS THE SUBMISSION DEADLINE?

Abstracts due: October 30, 2016

Manuscripts due: January 5, 2017

Manuscripts submitted after the due date, or without the presubmission abstract, will be considered for publication in the ongoing MPP series, but may not be published simultaneously with the promotional burst of articles.

If you have any questions, please E-mail the editorial offices: genetics-gsa@thegsajournals.org or g3-gsa@thegsajournals.org