**SPOTTED**

# Spotted around the web: Microglia classification; singing to babies; Mastodon

BY **JILL ADAMS**

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## WEEK OF NOVEMBER 7TH

### Research roundup

- Autistic adolescents shared their experiences, interests and future plans in structured interviews designed to accommodate a range of verbal and cognitive abilities. *Spectrum* covered the interview protocol in a **video** in August. ***Autism***
- Longitudinal studies must consider how best to transfer consent as autistic participants transition from childhood to adulthood. ***Journal of Autism and Developmental Disorders***
- An X chromosome analysis uncovers genes linked to cognition, language and seizures, and two genes newly linked to autism: CDK16 and TRPC5. ***Nature Communications***
- A new atlas catalogs adenosine-to-inosine editing sites in RNA, which are functionally linked to brain development, over space and time. ***Cell Reports***
- A group of researchers provides a conceptual framework to move beyond simplistic approaches for classifying microglia states and functions. ***Neuron***
- Singing to babies, which occurs across cultures, entrains social-visual behaviors in infants and reinforces the rhythms of social communication. ***PNAS***
- Sensory integration, such as coordinating tactile, visual and sensorimotor stimuli, may be altered in autistic children. ***Journal of Autism and Developmental Disorders***

**Multitasking pros:** Microglia have more than two states and influence a broad set of functions.

- People with the autism-linked DDX3X syndrome often have a complicated set of neurological, psychological, ophthalmological and gastrointestinal issues, according to a literature review. *Spectrum* reported on **DDX3X in girls and women** last year. ***Pediatric Neurology***
- Researchers have built a spatiotemporal atlas of fetal brain development from gestational week 23 to 38 using in utero MRI scans collected in China. ***Journal of Neuroscience***
- Telehealth visits have the potential to make care more accessible, but they introduce new bumps and barriers, autistic people and clinical care providers say. ***Autism***
- The Autism Impact Measure does not appear to assess autism traits differently in boys versus girls. ***Autism Research***
- Left-hemisphere areas of the brain that are active during a language task tend to be mirrored in the right hemisphere during a social task, suggesting a close integration of the two functions. ***Cell Reports***
- Optogenetic functional MRI data, together with computational modeling, may provide a clearer picture of whole-brain circuit functioning in health and disease, according to a review. ***Science***
- Newly identified electroencephalogram metrics may serve as noninvasive biomarkers for imbalanced excitatory and inhibitory brain activity, with potential future use in fine-tuning autism diagnoses. ***Translational Psychiatry***
- Methods to evaluate speech in minimally verbal autistic people vary in strengths and weaknesses, according to a review. ***Augmentative and Alternative Communication***

**Science and society**

- Gloria Choi, professor of brain and cognitive sciences at the Massachusetts Institute of Technology, shares her research on neuroimmune interactions during fetal development in a new Q&A. ***Neuron***
- Researchers across the globe have started turning to alternative social media sites, such as Mastodon, since Elon Musk bought Twitter. ***Science***
- As societal perceptions of autism have shifted, in part by listening to autistic people's voices, the label 'profound autism' has spurred a controversy. *Spectrum* has covered viewpoints from **parent advocates** and **researchers**. ***The Conversation***

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