COVID-19 Vaccination and People on the Autism Spectrum

Karen Remley, MD, MBA, MPH, FAAP
Director, National Center on Birth Defects and Developmental Disabilities

The Federal Response to COVID-19: Addressing the Needs of the Autism and Disability Communities
National Institute of Mental Health
28 April 2021

cdc.gov/coronavirus
Updates on vaccine recommendations and timeline
Currently authorized vaccines

- Pfizer-BioNTech
- Moderna

mRNA vaccines
Require two doses

Johnson & Johnson/Janssen

Viral vector vaccine
Requires one dose

All three vaccines were tested in tens of thousands of adults from diverse backgrounds, including older adults and communities of color.

All of the available vaccines have been proven effective at preventing serious illness, hospitalization, and death from COVID-19.

It is unknown how long protection from vaccines might last.

Health equity for people with disabilities

To help the United States succeed against COVID-19, federal, state, local, and tribal partners and community-serving organizations are working together to ensure all public health actions address health disparities for all populations.

Populations of focus:
- Racial and ethnic minority populations
- People living in rural or frontier areas
- People experiencing homelessness
- Essential and frontline workers
- People with disabilities
- People with substance use disorders
- People who are justice-involved

Intersection of disabilities and special healthcare needs

Birth defects
Developmental disabilities
Acquired disabilities

Underlying medical conditions

May affect various activities or domains

Vision
Thinking
Movement

Social relationships
Remembering
Communicating

Hearing
Mental health
Learning
COVID-19 Vaccination Accessibility

- CDC is working with partners across the country on implementation of vaccination plans for their respective areas.

- CDC playbook was developed to provide important information for jurisdictions to consider when vaccinating people with disabilities.


Available Accessible COVID-19 Resources

- Resources about COVID-19 for people with limited English and that are easy-to-read or in American Sign Language

- CDC Foundation supported the GA Institute of Technology (GA Tech) to translate COVID-19 resources into accessible formats

- Ongoing development of repository of accessible COVID-19 vaccine information


**Disability is a part of vaccine equity**
Supporting People with Autism Spectrum Disorder and Related Disabilities

- Partner organizations disseminating disability-related vaccine guidance and accessible documents
  - Autism Science Foundation
  - Autistic Self Advocacy Network
  - Autism Speaks
  - Autism Society
  - Other organizations such as AAP, AAHD, AAPD, AUCD, NACDD, NASEM and more

- **Disability Toolkit** with COVID-19 vaccine equity and prevention guidance
- **Promising Practices**: Reaching Populations with Limited Access to Vaccines
- **Prioritizing and Scheduling** People with Disabilities and Caregivers for Vaccination
Study to Explore Early Development

- CDC longitudinal study of children aged 3-9 with autism spectrum disorder, other developmental disabilities, and in the general population who participated at ages 2-5

- COVID-19 impacts including
  - Education and use of remote learning; use of services and telemedicine; testing and mitigation strategies; and changes in routines and well-being.
  - Changes in household structure, finances, employment and health insurance; and COVID-19 infection
  - Pre-COVID-19 and post-COVID-19 assessment of behavior problems
Considerations for pediatric populations and children with disabilities and special healthcare needs
## Vaccine clinical development: children

<table>
<thead>
<tr>
<th>Platform/Design</th>
<th>mRNA: encodes stabilized spike; lipid NP</th>
<th>mRNA: encodes 2P-stabilized spike; lipid NP</th>
<th>Replication incompetent Ad26; stabilized spike</th>
<th>Replication incompetent ChAdOx1 chimp Ad; wild type spike</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Dose/Schedule</strong></td>
<td>IM 2 doses X 30 µg 21 days apart</td>
<td>IM 2 doses 100 µg 28 days apart</td>
<td>IM 1 dose at 5 x 10^{10} vp (also testing 2 doses (0, 56 days))</td>
<td>IM 2 doses at 5 x 10^{10} vp (0, 28 days)</td>
</tr>
<tr>
<td><strong>Adults</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Current Status</strong></td>
<td>Emergency Use Authorization (EUA) ages 16 and up</td>
<td>EUA ages 18 and up</td>
<td>EUA ages 18 and up</td>
<td>Phase 3 adults</td>
</tr>
<tr>
<td><strong>Adolescents</strong></td>
<td>Fully enrolled</td>
<td>Fully enrolled</td>
<td>Start 4-6wks after results from adult trials</td>
<td>TBD</td>
</tr>
<tr>
<td><strong>Younger Children</strong></td>
<td>Studies have begun</td>
<td>Studies have begun</td>
<td>TBD</td>
<td>TBD</td>
</tr>
</tbody>
</table>

*Adapted from source: Emily Erbelding, M.D., M.P.H. Director, Division of Microbiology and Infectious Diseases, NIAID*
Routine vaccines widely available to pediatric populations

- Children receive routine vaccinations according to the recommended schedule.
- The Vaccines for Children (VFC) program provides vaccines at no cost to children who might not otherwise be vaccinated because of inability to pay.
- Approximately half of U.S. children are eligible for VFC and ~86% of U.S. pediatricians provide care in a VFC-enrolled practice.

https://www.cdc.gov/vaccines/parents/schedules/index.html


https://www.cdc.gov/vaccines/parents/schedules/index.html
Considerations for ensuring equity to vaccine access for children with disabilities or other healthcare needs

- It is important that people with disabilities get the COVID-19 vaccine.
- Some children may have more interaction with trusted healthcare or service specialists than with general pediatricians.
  - Pediatric hospital systems
  - Pediatric specialists and/or disability-specific practices and clinics
  - Occupational, physical, or speech specialists
- Vaccinating children with disabilities and special healthcare needs, their caregivers, family members (e.g., parents and siblings), and service providers as soon as they can to reduce risk of negative outcomes from COVID-19.
- Vaccination sites and providers and vaccination messaging should be accessible to all populations with disabilities.

The health of the child is the power of the nation.

APRIL 1918

Children's Year

APRIL 1919

UNITED STATES CHILDREN'S BUREAU AND WOMAN'S COMMITTEE OF THE COUNCIL OF NATIONAL DEFENSE
For more information, contact CDC
1-800-CDC-INFO (232-4636)

The findings and conclusions in this report are those of the authors and do not necessarily represent the official position of the Centers for Disease Control and Prevention.