



Ohio Vaccines for Children (VFC) Education Session

April 24, 2025

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Agenda

- Welcome.
- Objectives.
- Measles and Vaccine FAQ.
- Immunization Champion Award.
- Ohio School Immunization Trends.
- ImpactSIIS Update.
- VFC Announcements and Reminders.
- Questions.

Objectives

This education session will:

- Identify nuances of measles, mumps, and rubella (MMR) vaccine administration.
- Interpret immunization trends in Ohio schools.
- Describe the update to the forecasting tool in ImpactSIIS.
- Share VFC updates and reminders.

Vaccine Updates

Measles Overview

Measles Overview

- Symptoms appear seven to 14 days after exposure.
 - High fever.
 - Cough.
 - Runny nose (coryza).
 - Red, watery eyes (conjunctivitis).
 - Rash.
- Healthcare providers are required to report suspected measles cases immediately to their local health department.
- Laboratory results are crucial for identifying cases. Testing can be coordinated by public health.

Source: [CDC](https://www.cdc.gov)

Measles Overview

- Approximately three out of 10 people who are infected with measles will have a complication.
- Complications include:
 - Ear infections.
 - Pneumonia.
 - Encephalitis (swelling of the brain, which can lead to seizures).
 - Hemorrhagic measles.
 - Clotting disorders.
 - Death.

Source: [CDC](#)

How Measles Spreads

- Measles spreads through the air when an infected person coughs or sneezes.
- Measles is very contagious.
 - You can get measles just by being in a room where a person with measles has been. This can happen even up to two hours after that person has left.
 - You can spread measles to others from four days before through four days after the rash appears.

Source: [CDC](#)

Treatment

- There is no specific antiviral therapy for measles.
- Medical care is supportive and helps to relieve symptoms or complications, such as bacterial infections.

Source: [CDC](#)

MMR FAQs

What are the current recommendations for the use of measles, mumps, rubella (MMR) vaccine in children?

Answer:

- First dose routinely for all children at age 12 - 15 months.
- A second dose at age 4 - 6 years.

The second dose of MMR can be given as early as 28 days after the first dose and be counted as a valid dose if both doses were given after the child's first birthday.

If there is an outbreak in my community, can we vaccinate children younger than 12 months?

Answer:

Yes.

- MMR can be given to children as young as 6 months of age who are at **high risk of exposure**, such as during a community outbreak or international travel.
- An MMR vaccine given at 6 –11 months is given **in addition** to the two recommended doses, not as a replacement dose.

What are the contraindications for MMR vaccine?

Answer:

- History of a severe (anaphylactic) reaction to any vaccine component or following a previous dose of MMR (see specific package insert for details).
- Pregnancy. Pregnancy testing prior to vaccination is not required for child-bearing aged females.
- Severe immunosuppression from either disease or therapy.
- Family history of altered immunocompetence, unless verified clinically or by laboratory testing as immunocompetent.

What are the precautions for MMR vaccine?

Answer:

- Receipt of an antibody-containing blood product in the previous 11 months, depending on the type of blood product received. Specific intervals vary by product type.
- History of thrombocytopenia or thrombocytopenic purpura.
- Moderate or severe acute illness with or without fever.

Can I get an MMR if I need to have a TB test?

Answer:

Vaccination with live viruses, including measles, mumps, rubella, oral polio, varicella, and yellow fever may interfere with TB blood test and TB skin test reactions. For persons scheduled to receive a TB test, testing should be done:

- Either on the same day as vaccination with live-virus vaccine, or
- At least one month after the administration of the live-virus vaccine.
- Clients requiring a two-step TB skin test, either complete both skin tests first and give the measles vaccine on the second reading or wait one month after giving measles vaccine to do the two-step TB testing.

Source: [MMR or MMRV Vaccine: Discussing Options with Parents | CDC](#). [Clinical Testing Guidance for Tuberculosis: Interferon Gamma Release Assay | Tuberculosis \(TB\) | CDC](#)

What are the measles vaccine choices?

Answer:

- MMRII
 - This vaccine is for ages 6 months (minimum during outbreaks or travel to outbreak area) and older.
 - May be given subcutaneously or intramuscularly.
 - Minimum spacing of 28 days between doses.
 - Routinely given at 12-15 months and 4-6 years.

Source: [MMR or MMRV Vaccine: Discussing Options with Parents | CDC.](#)

What are the measles vaccine choices?

Answer:

- Priorix
 - This vaccine is for ages 6 months (minimum during outbreaks or travel to outbreak area) and older.
 - May only be given subcutaneously.
 - Minimum spacing of 28 days between doses.
 - Routinely given at 12-15 months and 4-6 years.

Source: [MMR or MMRV Vaccine: Discussing Options with Parents | CDC](#).

What are the measles vaccine choices?

Answer:

- MMRV (ProQuad) (MMR + varicella)
 - For children 12 months through 12 years of age.
 - Must have a minimum of three months spacing between doses.
 - Not recommended for the first dose of MMR and varicella vaccines in ages 12 months through 47 months.
 - May **NOT** be used for children under 12 months.

Source: [MMR or MMRV Vaccine: Discussing Options with Parents | CDC](#).

Is there any harm in giving a dose of MMR to a child whose record is lost, and the parent is not sure about the last dose of MMR?

Answer:

- In general, although it is not ideal, receiving extra doses of vaccine is okay. The vaccine must be considered in balancing the benefits and risks of extra doses.
- For details see the Extra Doses of Vaccine Antigens section of the ACIP “[General Best Practice Guidelines for Immunization](#).”

My baby is too young for the MMR vaccine. Is there anything I can do to protect them?

Answer:

- Babies younger than age 6 months are too young to get vaccinated but may have some protection from antibodies passed to them during pregnancy.
- Consider delaying travel, especially to areas with ongoing measles transmission.
- Good hand hygiene is always a good idea. Wash your hands using soap and water and scrub for at least 20 seconds or use alcohol-based hand sanitizer. Remind others in your home or anyone who is near your baby to do the same.
- Limit your baby's exposure to crowds, other children, and anyone with cold symptoms.
- Prevent germs at home. Disinfect objects and surfaces in your home regularly.

Does my child need a booster dose?

Answer:

No.

- People who received two doses of measles vaccine as children according to the U.S. vaccination schedule are protected for life, and they do not ever need a booster dose.
- Two doses of MMR vaccine are about **97%** effective at preventing measles; one dose is about **93%** effective.

MMR Myth Busting

I've heard it's better for children to get measles rather than get the vaccine. Is that true?

Answer:

No.

- Measles is a dangerous disease. The risks of severe illness, death, or lifelong complications from measles infection far outweigh the generally mild side effects some people experience following vaccination.
- The MMR vaccine is very safe. Serious reactions to the MMR vaccine are rare.

Source: [What to Know About Measles and Vaccines | Johns Hopkins | Bloomberg School of Public Health](#)

I've heard MMR vaccine causes autism.

Answer:

No.

Although the specific cause or causes of autism in all children are not fully known, multiple studies have shown that neither the MMR vaccine nor thimerosal causes autism.

The study that has been cited most often by those claiming that the MMR vaccine causes autism, has been proven to be critically flawed by experts.

Source: [Children's Hospital of Philadelphia](#)

People are saying this is the same measles we had in the 1960s. What's the big deal?

Answer:

Measles is an airborne, extremely infectious, and potentially severe rash illness.

Before the first measles vaccine became available in the U.S. (in 1963), among reported measles cases each year, an estimated:

- 400 to 500 people died.
- 48,000 were hospitalized.
- 1,000 suffered encephalitis (swelling of the brain).

Source: [CDC](#)

2025 Immunization Champion Award

2025 Immunization Champion Award

The Ohio Department of Health Immunization Program is seeking nominations to represent Ohio for the national **2025 Immunization Champion Award**. This award honors individuals who go above and beyond to support and/or promote immunizations in their community.

An **individual** can be recognized for their work in any vaccine category. Categories include leadership, collaboration, innovation, and advocacy. Self-nominations are welcome.

[Nomination forms](#) should be completed and submitted to Antoinette.Yuhas@odh.ohio.gov by **Friday, May 23, 2025**.



2025 Immunization Champion Award

Eligibility Requirements.

Who is eligible?

- Healthcare professionals (i.e., pharmacists, physicians, nurses, physicians' assistants, nurse practitioners, and medical assistants).
- Nonprofit leaders.
- Community activists.
- Parents.
- School and education leaders.
- Coalition members.
- Community-based organization members.
- Other immunization partners.



Image: [Check mark and x mark.](#)

2025 Immunization Champion Award

Eligibility Requirements.

Who is NOT eligible?

- Immunization program managers.
- County, state, and federal government employees **paid by state or federal immunization funding.**
- Individuals who have been affiliated with and/or employed by pharmaceutical companies.
- Individuals who have already received the award.
- Groups – **the award is only for an individual.**

Image: [Check mark and x mark.](#)



2025 Immunization Champion Award

How To Submit a Nomination:

The nomination form requires a photograph, and a completed nomination narrative. The packet also includes a consent waiver that must be signed and emailed with the nomination packet.

Please email your completed nomination packet to Antoinette Yuhas at: Antoinette.Yuhas@odh.ohio.gov by **Friday, May 23, 2025**.

Additional information can be found at: [2025 Immunization Champion Award Nomination Form - Association of Immunization Managers](#).

Please consider nominating someone from your agency or community who has been an instrumental advocate in promoting immunizations.

Ohio School Immunization Trends

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At the end of the presentation, you should have knowledge of:

- The importance of school vaccination requirements.
- Current Ohio school vaccination requirements.
- Immunization coverage and trends for the 2024-2025 school year.
- Methods to increase vaccine coverage rates.

Introduction

School vaccination requirements remain an important public health policy.

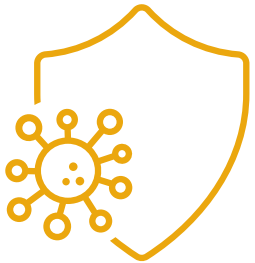
High vaccination levels prevent the spread of vaccine-preventable diseases (VPDs).

- Reduces the number of students, teachers, bus drivers, and school staff absent due to illness.
- Reduces probability of unplanned school closure due to illness.

Introduction

Current vaccine [requirements](#) for Ohio students help protect communities against 10 VPDs.

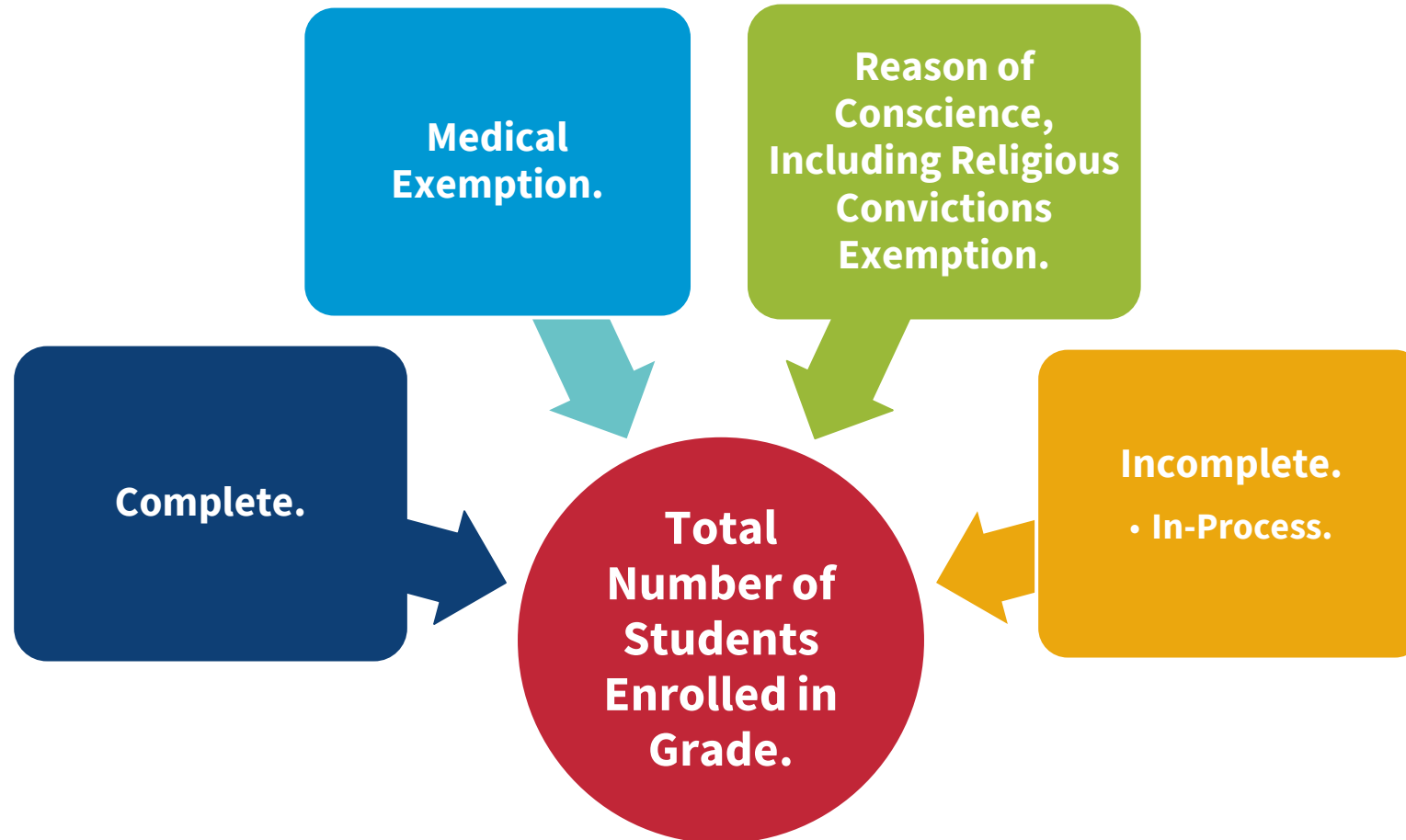
- Diphtheria.
- Hepatitis B.
- Measles.
- Meningococcal (ACWY).
- Mumps.
- Pertussis.
- Polio.
- Rubella.
- Tetanus.
- Varicella.



Data Source

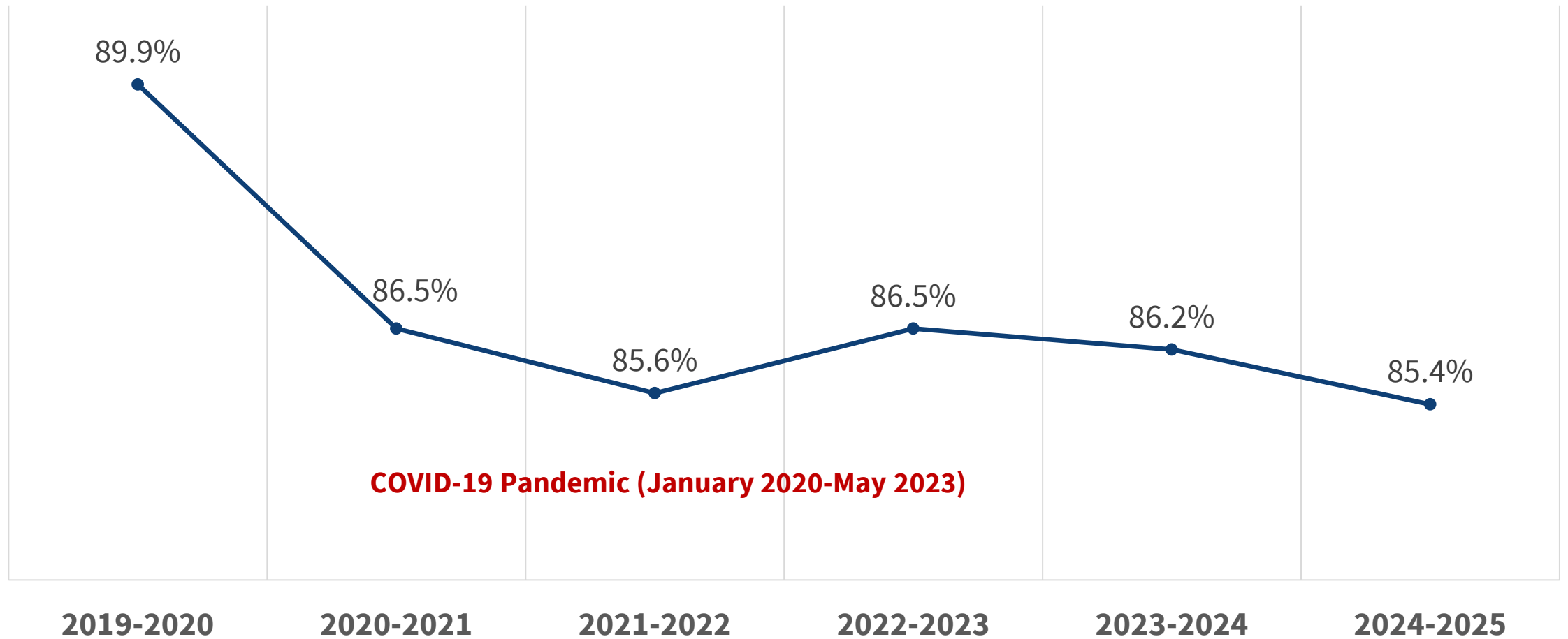
- Ohio Revised Code section [3313.67](#) requires that schools report the immunization status of students to the Ohio Department of Health (ODH) by Oct. 15 each year.
- Data presented in this report were collected from immunization summaries submitted to the ODH Immunization Program by Ohio schools for the 2024-2025 school year.

Immunization Status Definitions



School Immunization Coverage & Trends

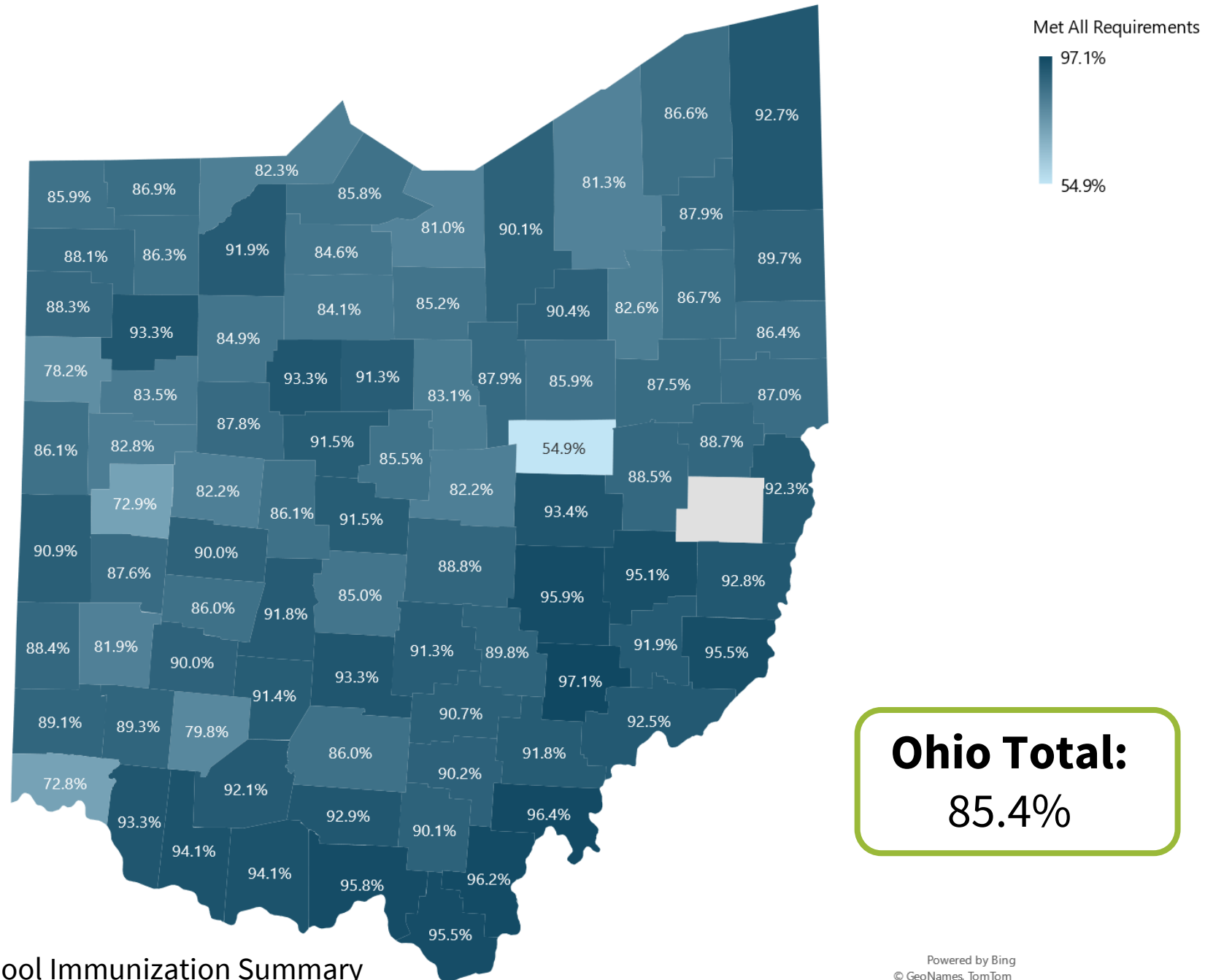
The **total percent of kindergarteners who met all requirements** was 85.4% in the 2024-2025 school year.



Source: Ohio Department of Health, Annual School Immunization Summary

2024-2025 School Year.

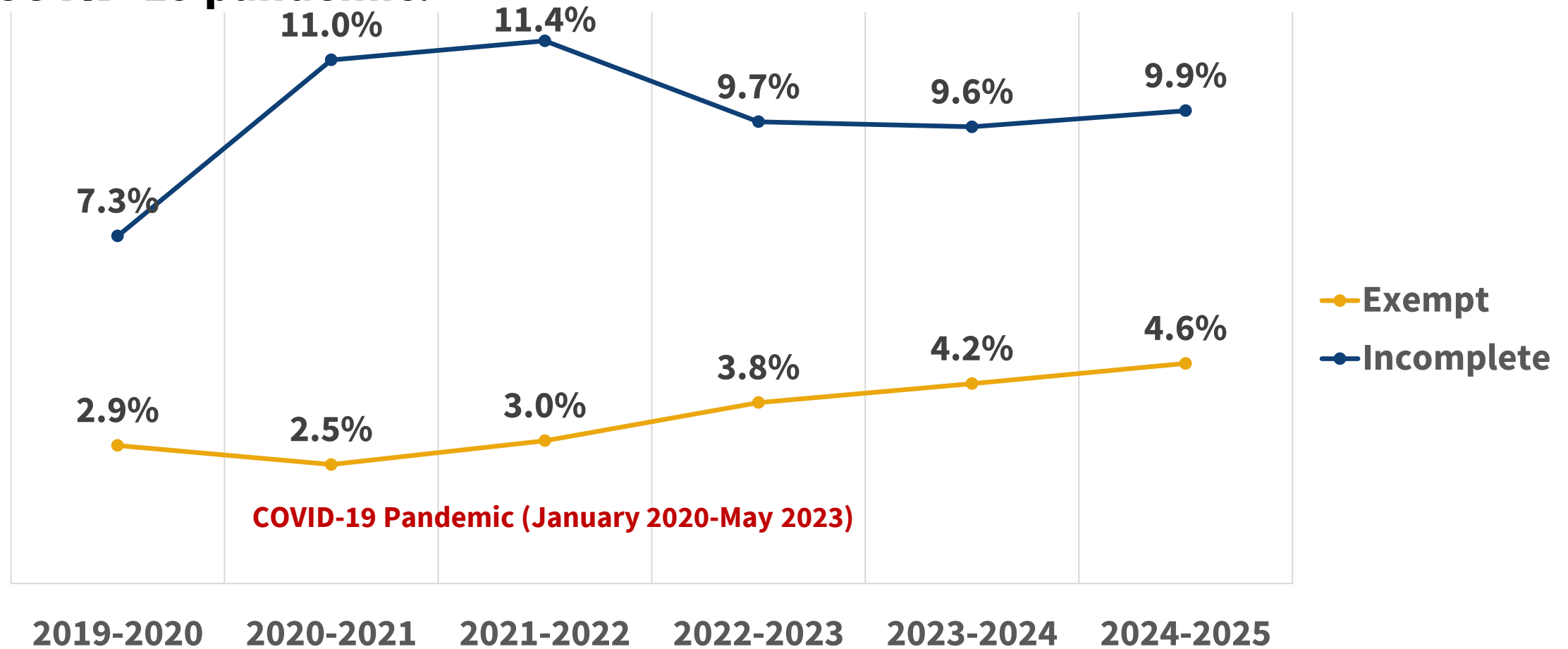
Coverage rates for kindergarteners who met all requirements vary by county.



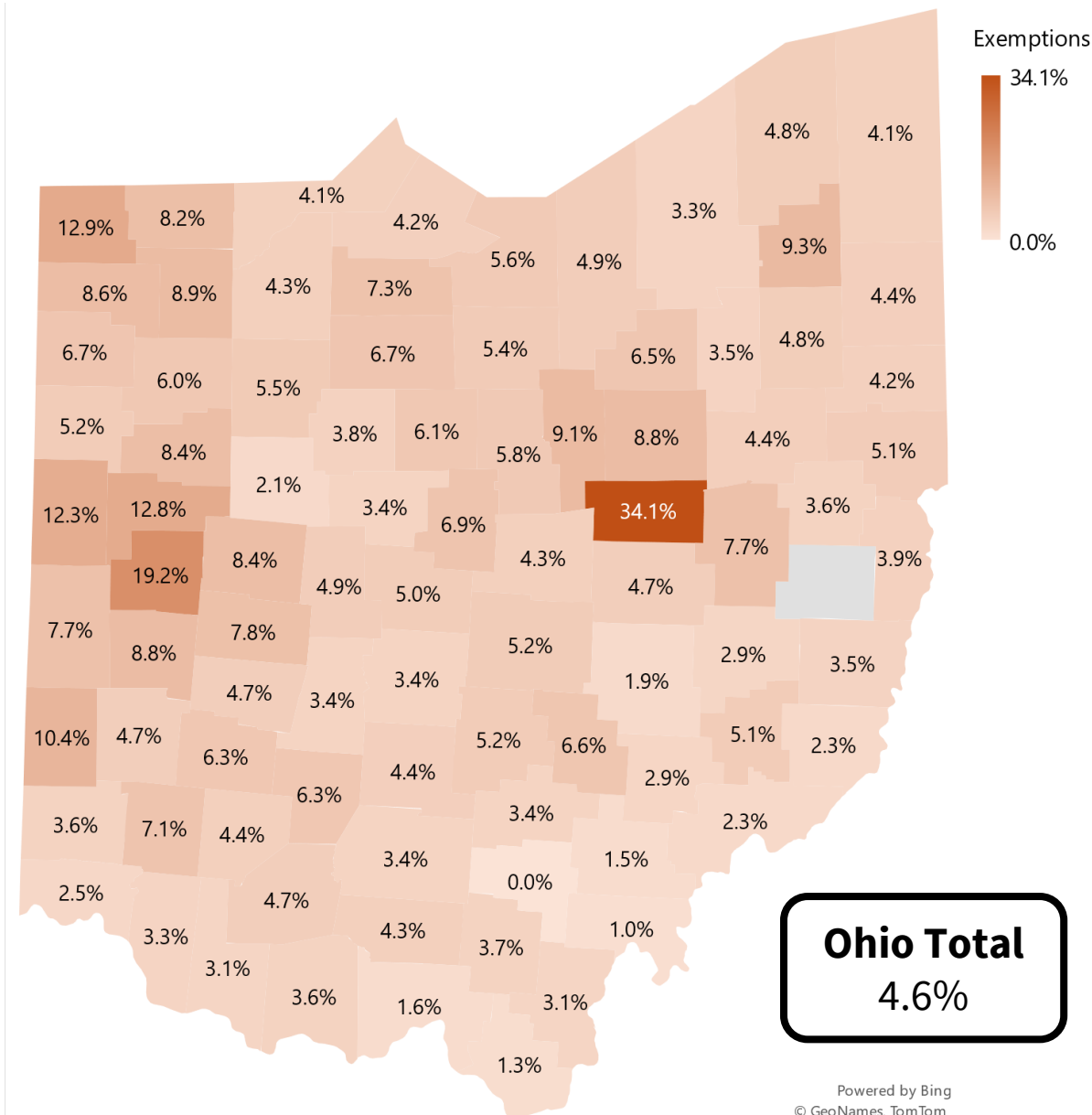
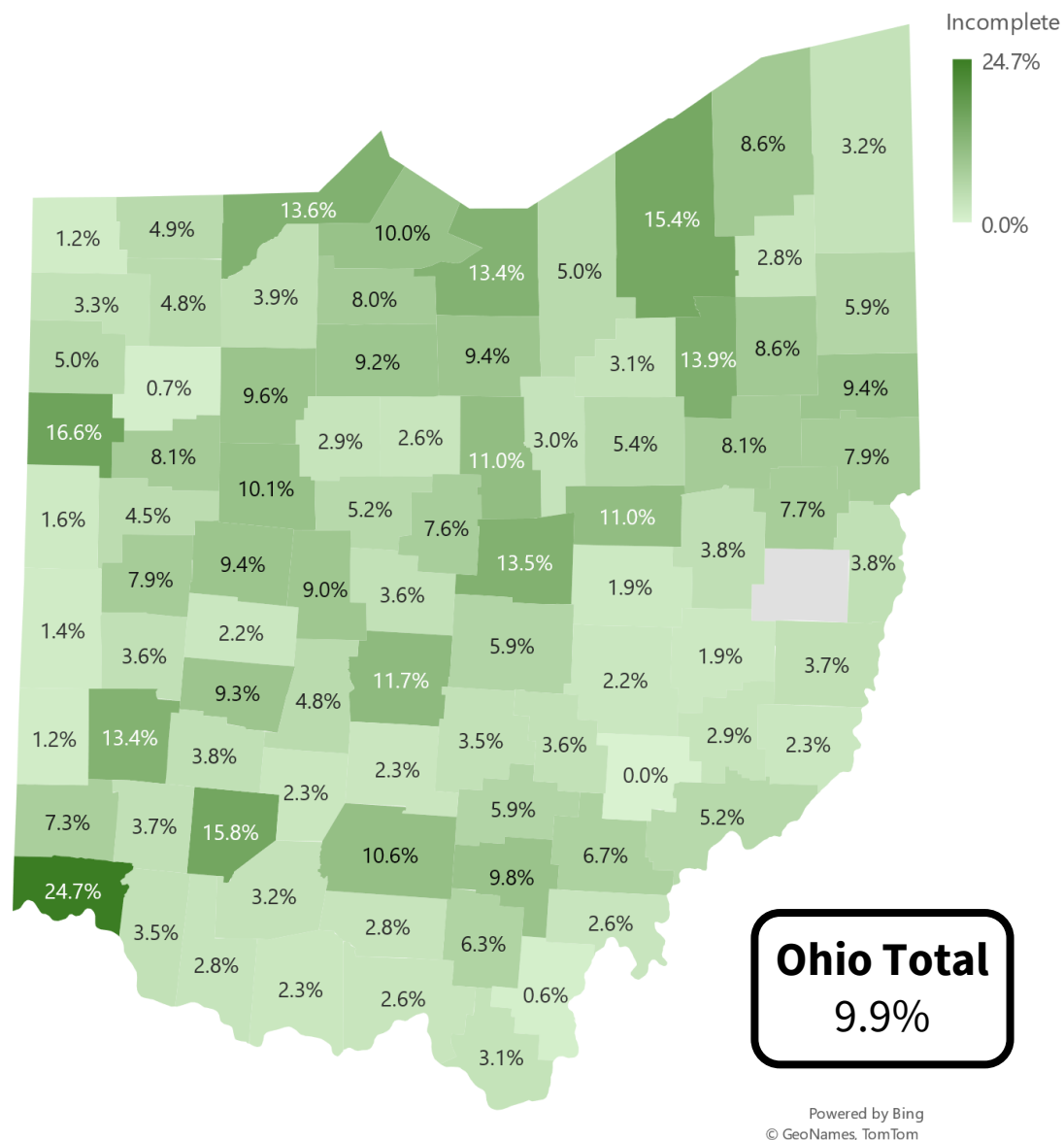
Ohio Total:
85.4%

Percent of total incomplete records rose slightly from the previous school year and has remained above pre-pandemic levels.

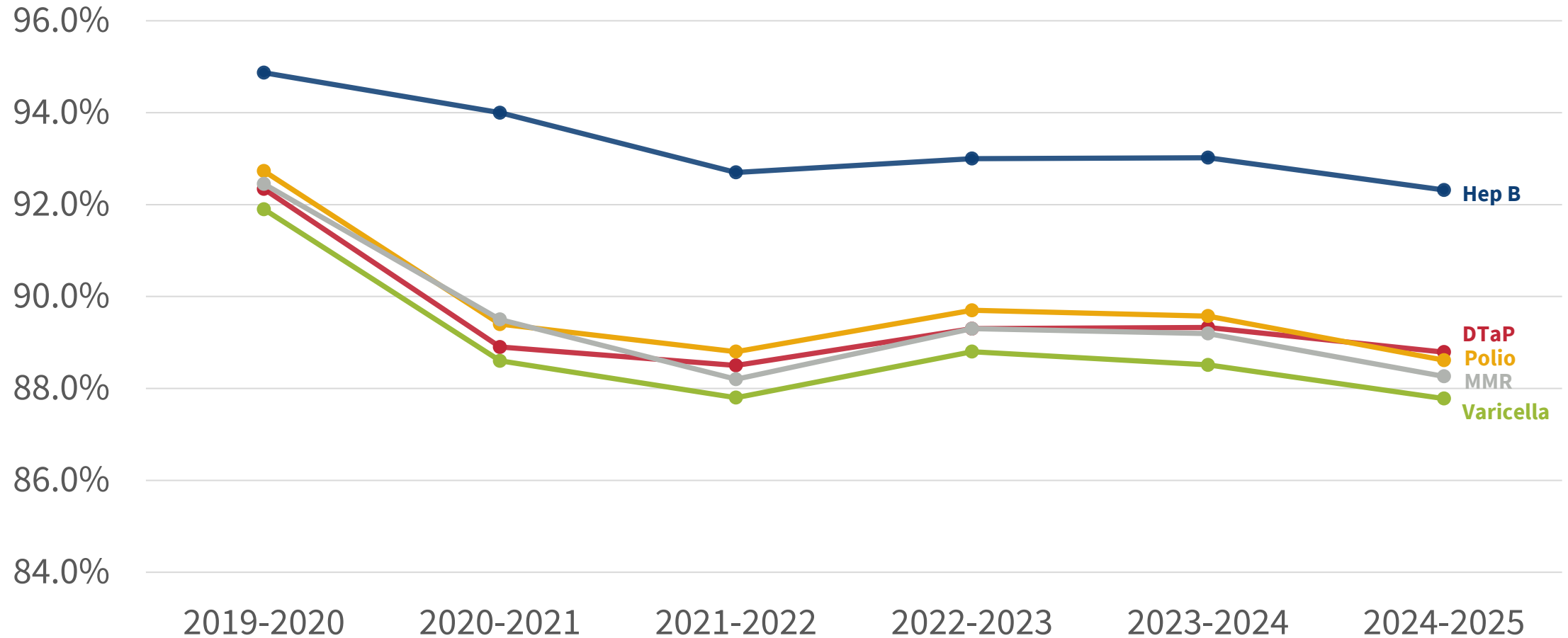
Ohio has seen an increase in exemptions since 2020-2021 school year, the COVID-19 pandemic.



2024-2025 school year: Kindergarten **incomplete** and **exemption** rates vary by county.

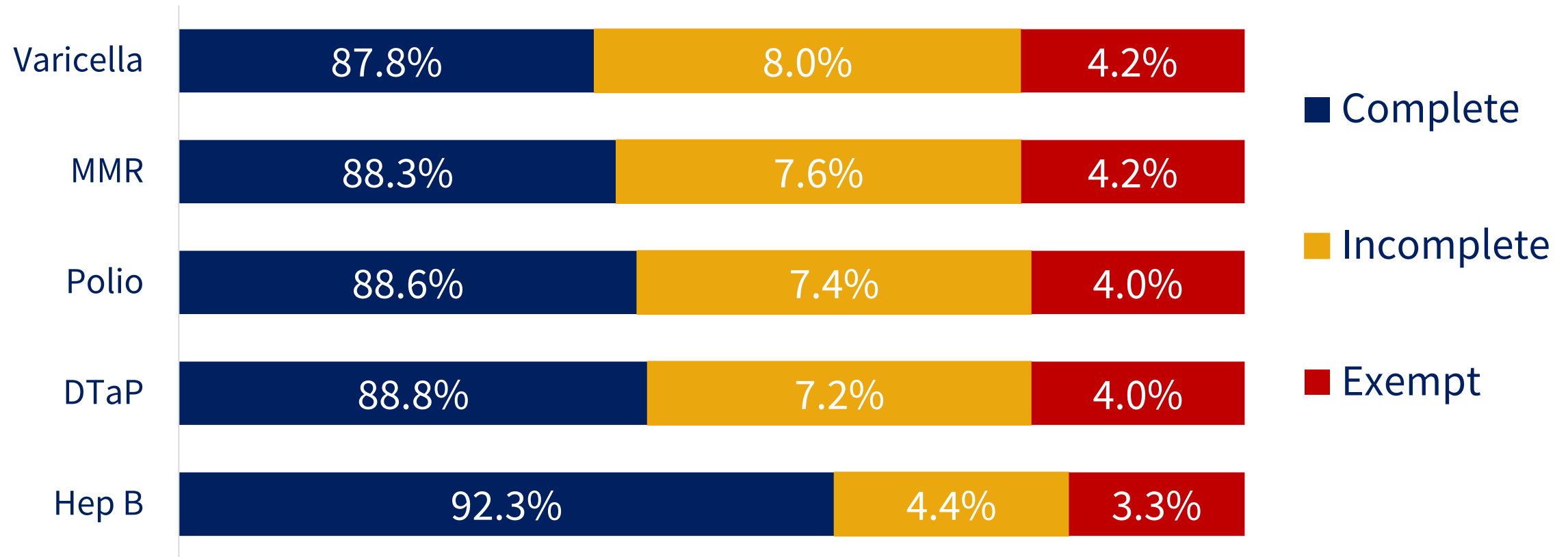


In 2024-2025, kindergarten **coverage decreased for all individual required antigens.** Largest decreases from the previous school year were seen for **Polio** (1%) and **MMR** (0.9%).

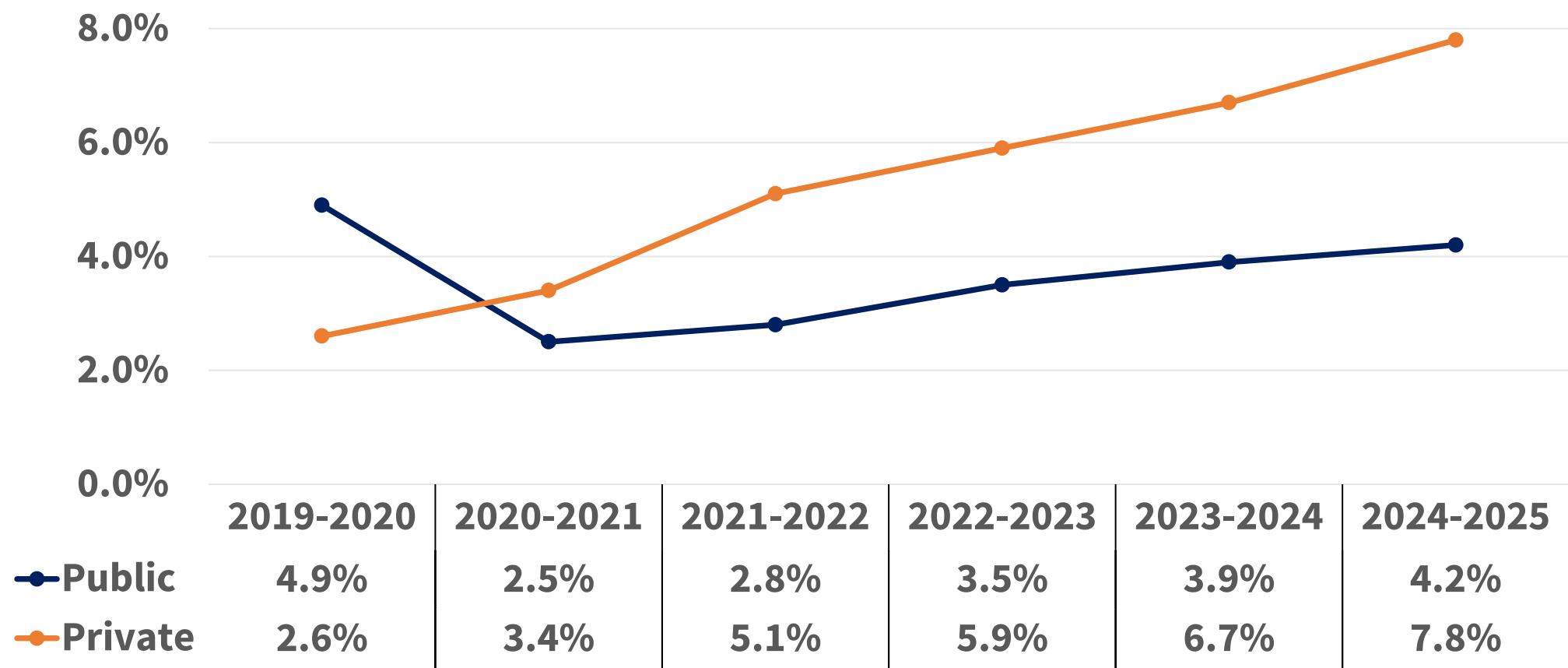


Source: Ohio Department of Health, Annual School Immunization Summary

In 2024-2025, **all single antigens saw an increase in both incomplete and exemptions** reported. With a 0.2% to 0.6% increase in incomplete and an 0.2% to 0.4% increase in exemption rates as compared to the previous school year.

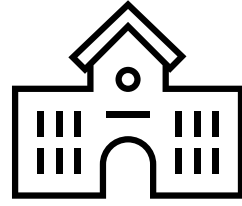


Both public and private schools have seen an increase in total exemptions since the pandemic. Over the last school year, **public school** total exemptions **rate rose 0.3%**. **Private school** total exemptions **rate rose 1.1%**.



Source: Ohio Department of Health, Annual School Immunization Summary

Increasing Vaccine Coverage Rates

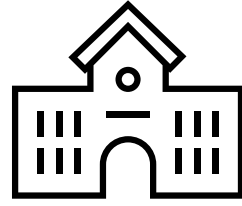


Create a culture of immunization within your office.

- Use positive language when discussing immunizations.
- Schedule future vaccine dose appointments before patients leaves.

Clinic information sharing empowers parents.

- Clinic hours, vaccination appointment scheduling links, website information.
- Kindergarten/school readiness packet, parent meetings, daycare/early childcare centers, high traffic community locations.



Reminder/recall encourages parents to stay on time.

- Keep children on track with the Advisory Committee on Immunization Practice (ACIP) recommended vaccine schedule.
- Opportunity for catch-up immunizations, if needed.

Education and awareness improves knowledge.

- Strong provider recommendation for immunization to adhere to Advisory Committee on Immunization Practices (ACIP) recommended vaccine schedule.
- Educate parents on the importance of Ohio school vaccination requirements.

Helpful Resources

ODH Immunization Kindergarten Through 12th Grade Vaccine Requirements [webpage](#).

- Director's Journal-School Requirements.
- Immunization Summary for School.
- Immunization Schedule and Catch-up Schedule.
- Resources for parents and guardians.

2024-2025 Ohio Kindergarten Measles, Mumps, Rubella (MMR) Rates, By County.

- [Up-to-Date Coverage Map](#).
- [Exemption Rates Map](#).

The screenshot shows the Ohio Department of Health website. The header includes the ODH logo and navigation links: WHO WE ARE ABOUT US, INFORMATION & PROGRAMS, HEALTH RULES LAWS & FORMS, EXPLORE DATA & STATS, and FIND LOCAL HEALTH DISTRICTS. A search bar is in the top right. The main content area is titled 'Kindergarten Through 12th Grade Vaccine Requirements'. It features a sidebar with links to Immunization, WELCOME, VACCINES FOR CHILDREN (VFC), VACCINES FOR CHILDREN COMMUNICATIONS, EARLY CHILDCARE VACCINE REQUIREMENTS, K-12 VACCINE REQUIREMENTS (highlighted), RECOMMENDED VACCINES FOR COLLEGE STUDENTS, IMMUNIZATION RATES, INFLUENZA (FLU), IMMUNIZATION RESOURCES, and IQIP PROGRAM. The main content area includes a photo of children running, a 'Share this' button with social media icons, and a section titled 'School Vaccination Requirements in Ohio (Kindergarten Through 12th Grade)'. This section states that Ohio Revised Code 3313.671 requires students to be fully protected against 10 vaccine-preventable diseases and lists them: Diphtheria, Hepatitis B, Measles, Meningococcal, Mumps, Pertussis, Polio, Rubella, Tetanus, and Varicella. A link to the Ohio Revised Code 3313.671 is provided at the bottom.

Helpful Resources

Non-Medical Exemptions and Vaccine Refusals Put People at Risk. Examine the Evidence for Yourself (Immunize.org).

Non-Medical Exemptions and Vaccine Refusal Put People at Risk. Examine the Evidence for Yourself.

Enforcement of immunization requirements for children entering childcare facilities and schools has resulted in sustained, high immunization coverage levels. While all states and the District of Columbia allow exemptions from requirements for medical reasons, as of June 5, 2024, all but six offer exemptions to accommodate religious beliefs, and 19 states and the District of Columbia allow exemptions based on parents' personal beliefs. Childhood immunization

coverage levels are lower when non-medical exemptions to requirements are available, especially if they are easy to get. Outbreaks of vaccine-preventable diseases, such as measles, pertussis, and varicella, have been traced to pockets of unvaccinated children. Examine for yourself the evidence for the consequences of allowing immunization coverage levels to fall.

1. **Measles – United States, January 1, 2020–March 28, 2024.** Mathis AD, Raines K, Masters NB, et al. CDC. *Morbidity and Mortality Weekly Report (MMWR)*, April 11, 2024; 73(14):295–300.

SUMMARY: Summary: During January 1, 2020–March 28, 2024, CDC was notified of 338 confirmed measles cases which occurred in 30 jurisdictions; 29% of these cases occurred in the first quarter of 2024. Among the 338 cases, the median age was 3 years (range 0–64) and 309 (91%) were unvaccinated or had unknown vaccination status. The 338 cases represented 92 identified chains of transmission, 20 (22%) of which were associated with outbreaks of 3 or more cases. Clusters of unvaccinated people placed communities at risk of large outbreaks as was seen in central Ohio in 2022. There were 86 cases identified and the outbreak lasted 63 days; 94% of cases were unvaccinated and 42% were hospitalized.

KEY FINDINGS: The article affirms that measles elimination in the U.S. has been maintained and highlights the risk for reintroduction of measles due to ongoing outbreaks overseas and lower global measles vaccination coverage. Among 93 measles cases that were directly imported from another country, 63% occurred in U.S. residents, 90% of whom were eligible for vaccination but were unvaccinated or their vaccination status was unknown. Two-dose MMR coverage in the U.S. has remained below 95% for three consecutive years and some jurisdictions have reported coverage below 90%. For the 2022–2023 school year, 10 states reported exemptions rates among kindergarten children of >5%. Maintaining measles elimination will require increasing MMR coverage, identifying undervaccinated communities, encouraging vaccination prior to international travel, and maintaining a strong surveillance system.

LINK: www.cdc.gov/mmwr/volumes/73/wr/mm7314a1.htm

2. **Community Outbreak of Measles – Clark County, Washington, 2018–2019.** Carlson A, Riethman M, Gastafaduy P, et al. CDC. *Morbidity and Mortality Weekly Report (MMWR)*, May 17, 2019; 68(19):446–7.

SUMMARY: On December 31, 2018, Clark County Public Health in Washington was notified of a suspected case of measles in an unvaccinated 10-year-old child, who had recently arrived from Ukraine. By January 16, an additional 12 laboratory-confirmed cases led to an approximately 200 person multigenerational response. As of March 28, measles had been confirmed among 71 Clark County residents, with rash onsets from December 30, 2018 to March 13, 2019.

KEY FINDINGS: Among the 71 patients with confirmed measles, ages ranged from 1 to 39 years; 52 (73%) were children younger than 10 years. Sixty-one (86%) were unvaccinated, 3 (4%) had received 1 dose of MMR before measles exposure, and vaccination status was unknown for 7 (10%).

LINK: www.cdc.gov/mmwr/volumes/68/wr/mm6819a5.htm

3. **Notes from the Field: Tetanus in an Unvaccinated Child – Oregon, 2017.** Weekly, March 8, 2019; 68(9). Guzman-Cottrill R, Lancioni C, Eriksson C, Yoon-Jae C, Liko J. CDC. *Morbidity and Mortality Weekly Report (MMWR)*, March 8, 2019; 68(9):231–2.

SUMMARY: The article describes a case of tetanus in an unvaccinated 6-year-old boy after he sustained a forehead laceration while playing outdoors on a farm. Six days later he developed episodes of crying, jaw clenching, and involuntary upper extremity muscle spasms, followed by arching of the neck and back (opisthotonus) and generalized spasticity. He was brought for medical care after having difficulty breathing and a diagnosis of tetanus was made. The child made a full recovery but required 57 days of inpatient care and 17 days of inpatient rehabilitation at a cost of over \$800,000. The family declined subsequent doses of DTaP and other recommended vaccinations.

KEY FINDINGS: Tetanus, caused by *Clostridium tetani*, is a serious bacterial infection and can be prevented with vaccination with any available tetanus toxoid-containing vaccine (DTaP, Td, Tdap). With widespread use of these vaccines, cases of tetanus in the U.S. have declined by 95% and tetanus-related deaths by 99%. From 2009 to 2015, 197 tetanus cases and 16 tetanus-associated deaths were reported in the United States. Unvaccinated or inadequately vaccinated people are at risk for tetanus, as this case demonstrates. Recovery from tetanus disease does not confer immunity so follow up vaccination is important.

LINK: www.cdc.gov/mmwr/volumes/68/wr/mm6809a3.htm

4. **Public Health Consequences of a 2013 Measles Outbreak in New York City.** Rosen JB, Arciuolo RJ, et al. *JAMA Pediatr.* 2018; 172(9): 811–7.

SUMMARY: Between March 13, 2013 and June 9, 2013, 58 persons in New York City with a median age of 3 years were identified as having measles. Among these individuals, 45 (78%) were at least 12 months old and were unvaccinated owing to parental refusal or intentional delay. In total, 3,351 exposed contacts were identified.

CONTINUED ON THE NEXT PAGE ►



FOR PROFESSIONALS www.immunize.org / FOR THE PUBLIC www.vaccineinformation.org

www.immunize.org/catg.d/p2069.pdf
Item #P2069 (6/11/2024)



Scan for PDF

Helpful Resources

Clinical Resources: Addressing Vaccine Anxiety (Immunize.org).

Addressing Vaccination Anxiety for Children

Strategies for Healthcare Professionals



Fear of needles and vaccine visits is common in older children. What you do and say can help children experience less pain and help parents and children more readily accept recommended vaccinations. Below are strategies that can improve the vaccination experience, especially when combined. Consider what is practical. Simply acknowledging the feelings of both child and caregiver and letting them know you care can help.

Before the Visit

Pre-registration may minimize time in the waiting room where anxiety can mount.

Establish expectations. If possible, let families know the child will be offered any needed vaccinations and that you'll work with them to make the experience comfortable.

Have the caregiver bring a favorite comfort item or "fidget item" from home (e.g., spinner, game).

Set up the vaccination room/area so it's comfortable and private. Keep needles out of sight until necessary.

Consider topical analgesia (e.g., 5% lidocaine cream, spray, or patch). This may help with pain but needs to be applied to the vaccination site 30 to 60 minutes ahead of time. With guidance, some families may accomplish this before arriving.¹

During the Visit

Ask the caregiver and child how the child handles vaccinations.² What helps them cope? If needed, remind the caregiver that their calm and supportive attitude will make the child feel more secure.

Invite the caregiver and child, as appropriate, to **ask questions** so they feel prepared.

Watch your words! Use words that help the child cope during vaccination. Using fear-provoking words (e.g., 'shot', 'sting') or false reassurances ("It won't hurt a bit") can increase a child's distress and pain.³

Offer suggestions of coping strategies, if needed. Slow deep breaths before, during, and after vaccination can be calming. Some children want to see the vaccination, but most children like to be distracted. Encourage those children to talk about something else pleasant or play with a mobile device. Displaying fun posters in the vaccination area can provide distraction, too.⁴

KEY IDEA: Asking parents and children what helps them cope is essential. Support their choices, when feasible.

Non-pharmacological Pain Management Options

In addition to topical analgesics (see above), non-pharmacological pain control strategies can temporarily "confuse and distract" pain sensors. Options include:

Cooling the injection site with a vapocoolant spray immediately before injection.

Using pain-minimizing injection techniques: Don't aspirate before injecting. Inject quickly. If giving multiple injections, give the most painful vaccine last.

Placing a vibrating case with optional ice pack (e.g., Buzzy by Pain Care Labs) proximal to the injection site.

Placing a plastic device with several short, blunt contact points (e.g., ShotBlocker by Bionix, pictured right) on the patient's skin before injection. These are non-prescription, inexpensive and can be cleaned and reused.



If helpful, some families may keep one for future vaccinations.

After the Visit

Use of pain-reducing medicines (e.g., ibuprofen or acetaminophen) before vaccination is not recommended because it might diminish the immune system's response

to vaccination. These medicines may be used as needed to treat pain or fever after vaccination.



**Department of
Health**

Helpful Resources

Evidence Shows Vaccines Unrelated to Autism (Immunize.org).

Evidence Shows Vaccines Unrelated to Autism

Erroneous claims that vaccines cause autism have led some parents to delay or refuse vaccines for their children. Some of the claims are that autism is caused by measles-mumps-rubella (MMR) vaccine, vaccines that contain thimerosal, or by too many vaccines. Many studies have been done to test these claims. None has shown that vaccines cause autism. The real causes of autism are not fully known, but the past

decade of research supports the role of genetics in an autism diagnosis. In fact, no scientific question into the causes of autism has been better researched, tested, and examined as the role of vaccines in autism. Volumes of evidence show no link between the two.

This sheet lays out the facts to help parents understand why experts do not think vaccines cause autism.

Medical and legal authorities agree that no evidence exists that vaccines cause autism.

The Institute of Medicine (now known as the National Academy of Medicine) is an impartial group of the world's leading experts that advises Congress on science issues. After reviewing more than 200 studies in 2004 and more than 1,000 studies in 2011, their report strongly stated that the evidence did not show a link between vaccines and autism.

In 2014, researchers from the RAND Corporation published an update to the 2011 Institute of Medicine's report. In a systematic review of the evidence published on vaccine safety to date, they found the evidence was strong that MMR vaccine is not associated with autism.

In 2009, the U.S. federal court reviewed 939 medical articles in their hearings. The court found the evidence was "overwhelmingly contrary" to the theory that autism is linked to MMR vaccine, thimerosal, or a combination of the two. Since then, additional scientific evidence adds evidence to the conclusion that neither vaccines, nor the thimerosal in vaccines, was linked to autism.

Based on the research, the World Health Organization, the European Medicines Agency, Health Canada, and other national and international health groups have concluded that no link can be found between vaccines and autism.

REFERENCES

Institute of Medicine. *Adverse Effects of Vaccines: Evidence and Causality*. National Academies Press. 2011. www.ncbi.nlm.nih.gov/books/NBK190024/
Institute of Medicine. *Immunization Safety Review: Vaccines and Autism*. National Academies Press. 2004. www.ncbi.nlm.nih.gov/pubmed/20669467
Maglione MA, Das L, Raen L, et al. Safety of Vaccines Used for Routine Immunization of U.S. Children: A Systematic Review. *Pediatrics*. 2014; 134(2):325–337. <https://pediatrics.aappublications.org/content/134/2/325>

The causes of autism are not fully understood, but the evidence does not point toward vaccines.

Parents often first notice the behaviors of autism when their child is 18–24 months old — the age by which most childhood vaccines have been given. Because of this, parents may incorrectly associate vaccination with the onset of autism. However, the data show otherwise. For the past 20 years, clinicians have been closely studying the infant siblings of children with an autism diagnosis. These children have up to a 30x likelihood of a diagnosis compared to those with no family history. As infants, they start to show early developmental delays as young as 6 months of age. If you have a family history of autism, please tell your pediatrician so your child can be closely monitored. Unfortunately, past research has shown that these infants are less likely to be vaccinated, but still more likely to develop an autism diagnosis. New technologies have allowed scientists to investigate brain development in infants with a higher likelihood of a diagnosis. Their brain development shows differences from typical infants as early as 6 months of age. The developmental cascade that leads to an autism diagnosis starts well before parents see noticeable symptoms.

This is only part of the evidence that demonstrates that heritable factors, including genetic and environmental factors, are responsible for autism. Autism runs in families. Genes that lead to an autism diagnosis are sometimes seen in parents or other family members, but sometimes these genetic variants are seen only in the child with a diagnosis. These genes control the way brain cells communicate with each other and how brain cells interact in areas of the brain that are known to be associated with language, cognition, emotion and processing of information. The types of brain cells that are affected in autism start to grow during prenatal development, adding to evidence that autism starts before birth.

Just like any complex disorder, genetics together with environmental factors play a role. Scientists found that being sick during pregnancy triggers an immune response that

CONTINUED ON THE NEXT PAGE ►



FOR PROFESSIONALS www.immunize.org / FOR THE PUBLIC www.vaccineinformation.org

www.immunize.org/catg.d/p4028.pdf
Item #P4028 (1/21/2025)



Department of
Health

Helpful Resources

Children's Hospital of Philadelphia (CHOP) Vaccine Resources.



Vaccine- and Vaccine Safety-Related Q&A Sheets

Downloadable sheets with answers to commonly asked questions about vaccines and the diseases they prevent

TETANUS WHAT YOU SHOULD KNOW

WHAT IS TETANUS?
Tetanus is an infection caused by the bacterium *Clostridium tetani*, which is commonly found in soil. The bacterium enters a body through a wound, but causes trouble inside.

HOW IS TETANUS SPREAD?
Tetanus is spread when a person gets a wound that is not cleaned properly. The bacterium enters the wound through the wound. It can also enter through a cut, scratch, or burn. It can also enter through a wound that is not cleaned properly. The bacterium enters the wound through the wound. It can also enter through a cut, scratch, or burn. It can also enter through a wound that is not cleaned properly.



"Special Topics" Q&A Sheets

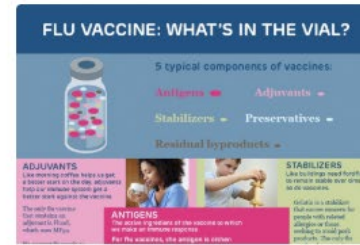
Downloadable sheets covering topics like vaccines & cancer, travel, rabies, fever, pregnancy, biologics & more

VACCINE SAFETY and YOUR FAMILY

Separating Fact from Fiction

Booklets, Posters & Other Materials

Info in various formats covering vaccines for different ages, vaccine safety, rashes & the immunization schedule



Infographics

Image-based resources with easy-to-understand overviews of popular vaccine-related topics



Videos: Vaccines and Related Topics

Various video series address vaccines, the diseases they prevent, and common related questions



International Materials

Find select VEC resources offered in Greek, Japanese, Kazakh, Polish, Somali and Ukrainian.

Vaccine Schedule Logic Changes in ImpactSIIS

New ImpactSIS Vaccine Schedule Logic

- ImpactSIS plans to adopt new vaccine schedule logic in Spring 2025.
- This new logic is based on the vaccine schedule recommended by the Advisory Committee on Immunization Practices (ACIP).
- This will change the way ImpactSIS evaluates whether doses have been given according to ACIP recommendations.
- This will also change the way ImpactSIS calculates and informs users when the next dose of an ACIP-recommended vaccine will be due. This is sometimes called ‘forecasting.’

Changes to Expect:

- The Tdap vaccine will be included in the **DTaP/Tdap/Td** Vaccine Group.
- A **Hep-B** Vaccine Group will combine groups called **Hep-B 3 Dose** and **Hep-B 2 Dose**.
- A **Pneumococcal** Vaccine Group will combine recommendations for PCV and PPSV23.
- A **Meningococcal B** vaccine group will combine recommendations for **Meningococcal B, Recombinant** and **Meningococcal B, OMV**.

Changes to Expect:

Name changes are highlighted below. The Vaccination Forecast will display information even about vaccines the patient isn't due for- see Rotavirus and Varicella in the "Updated Version" below.

March 2025 Version:

Patient		
Name:	FORECAST TESTPATIENT	SIIS Pa
Date of Birth:	10/01/2023	Age:
Guardian:	GUARDIAN	Organiz

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Vaccination Forecast

The forecast automatically switches to the catch-up schedule when a patient

Vaccine Group	Forecasted Dose	R
HEP-B 3 DOSE	1	
HIB	1	
PNEUMO (PCV)	1	
POLIO	1	
Coronavirus (SARS-CoV-2)(COVID-19)	1	
FLU	1	
HEP-A	1	
DTaP/DT/Td	5	
MMR	2	
HPV	1	
MENINGOCOCCAL	1	
MENINGOCOCCAL B, OMV	1	
MENINGOCOCCAL B, RECOMBINANT	1	
PNEUMO (PPSV)	1	

Vaccination View/Add

The patient was reported to have had the Chickenpox disease

(H - Historicals , # - Adverse Reaction , ! - Warning , ! - Warning , ! - Warning)

Documented By:

Updated Version:

Patient		
Name:	FORECAST TESTPATIENT	
Date of Birth:	10/01/2023	
Guardian:	GUARDIAN	

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Vaccination Forecast

The forecast automatically switches to the catch-up schedule when a patient

Vaccine Group	Forecasted Dose	R
HepB	1	
Hib	1	
Pneumococcal	1	
Polio	1	
COVID-19	1	
HepA	1	
Influenza	1	
DTaP/Tdap/Td	5	
MMR	2	
HPV	1	
Meningococcal	1	
Meningococcal B	1	
Zoster	1	
RSV	1	
Rotavirus		
Varicella		

Vaccination View/Add

The patient was reported to have had the Chickenpox disease

(H - Historicals , # - Adverse Reaction , U - Unverified History)

Documented By:

Changes to Expect:

The Forecast displays some new statuses, like **Complete**, **Aged Out**, or **Contraindicated**.

In the updated version below, note that MMR given in April 2025 would be valid, but not yet recommended, so its status is **Optional** in the updated version rather than **Not Yet Due**.

March 2025 Version:

Vaccination Forecast					
The forecast automatically switches to the catch-up schedule when a patient is behind schedule.					
Vaccine Group	Forecasted Dose	Recommended Date	Minimum Valid Date	Overdue Date	Status
HEP-B 3 DOSE	1	10/01/2023	10/01/2023	10/28/2023	Past Due
HIB	1	12/01/2023	11/12/2023	02/01/2024	Past Due
PNEUMO (PCV)	1	12/01/2023	11/12/2023	01/28/2024	Past Due
POLIO	1	12/01/2023	11/12/2023	01/01/2024	Past Due
Coronavirus (SARS-CoV-2)(COVID-19)	1	04/01/2024	04/01/2024	04/28/2024	Past Due
FLU	1	04/01/2024	04/01/2024	04/28/2024	Past Due
HEP-A	1	10/01/2024	10/01/2024	10/28/2025	Due Now
DTaP/DT/Td	5	10/01/2027	10/01/2027	09/30/2030	Not Yet Due
MMR	2	10/01/2027	11/11/2024	10/28/2030	Not Yet Due
HPV	1	10/01/2034	10/01/2032	10/28/2036	Not Yet Due

Updated Version:

Vaccination Forecast					
The forecast automatically switches to the catch-up schedule when a patient is behind schedule.					
Vaccine Group	Forecasted Dose	Recommended Date	Minimum Valid Date	Overdue Date	Status
HepB	1	10/01/2023	10/01/2023	10/28/2023	Past Due
Hib	1	12/01/2023	11/12/2023	01/28/2024	Past Due
Pneumococcal	1	12/01/2023	11/12/2023	01/28/2024	Past Due
Polio	1	12/01/2023	11/12/2023	01/28/2024	Past Due
COVID-19	1	08/22/2024	08/22/2024	09/18/2024	Past Due
HepA	1	10/01/2024	10/01/2024	10/28/2025	Due Now
Influenza	1	11/04/2024	11/04/2024	12/01/2024	Past Due
DTaP/Tdap/Td	5	10/01/2027	10/01/2027	09/30/2030	Not Yet Due
MMR	2	10/01/2027	11/04/2024	10/28/2030	Optional
HPV	1	10/01/2034	10/01/2032	10/28/2036	Not Yet Due
Meningococcal	1	10/01/2034	10/01/2034	10/28/2036	Not Yet Due
Meningococcal B	1	10/01/2039	10/01/2039	10/28/2039	Not Yet Due
Zoster	1	10/01/2073	10/01/2073	10/28/2073	Not Yet Due
RSV	1	10/01/2098	10/01/2098	10/28/2098	Not Yet Due
Rotavirus					Aged Out
Varicella					Contraindicated

Changes to Expect:

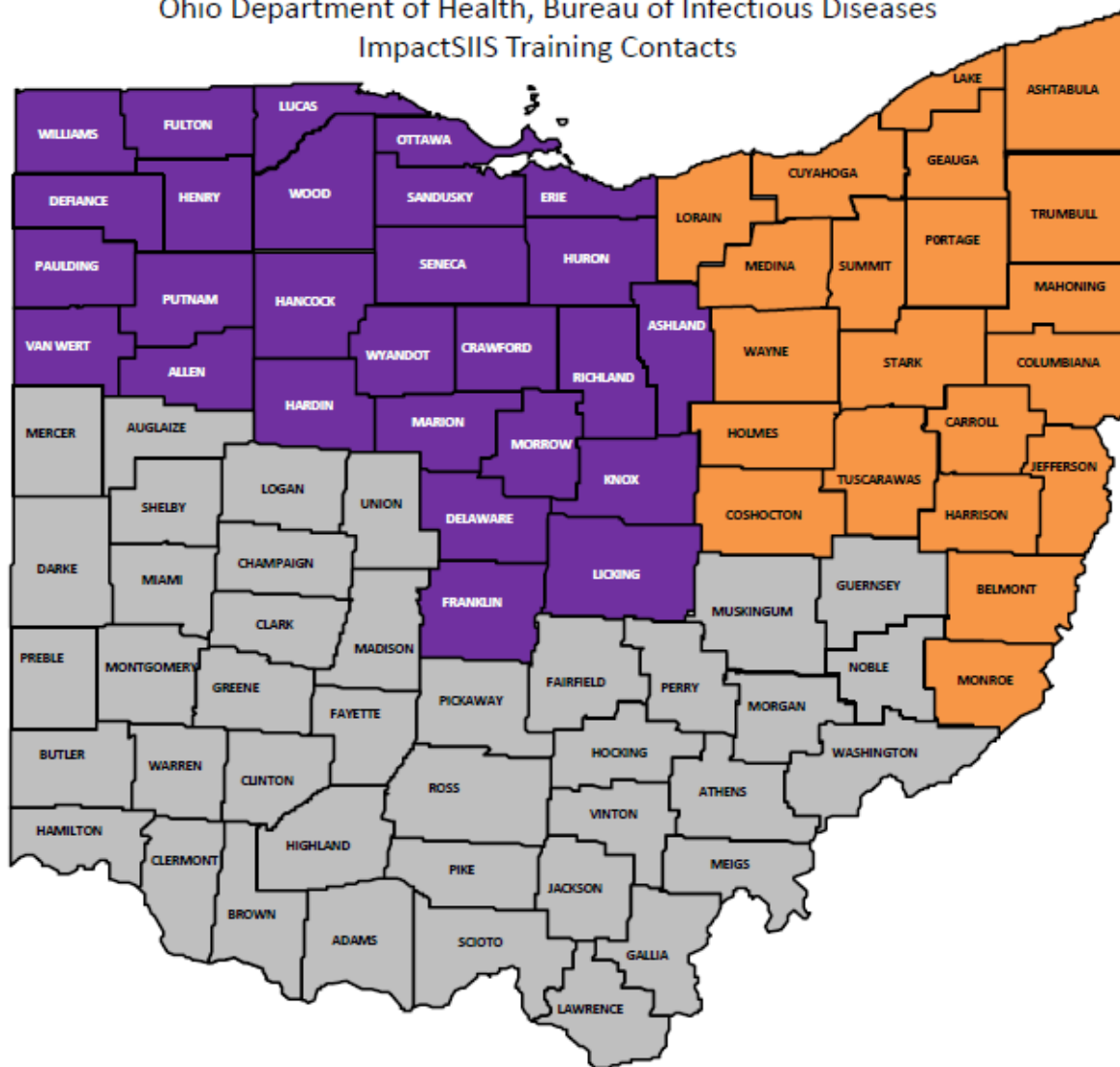
Also, descriptions of the reason a particular vaccination is considered by the system to be invalid have been simplified. Examples are listed below.

Changes to Invalid Vaccination Reasons	
March 2025	Updated Version
Minimum age for this dose not met.	Too Young.
Patient age outside of recommended schedule.	Too Old.
Minimum interval from previous dose not met.	Too Soon.
Tdap administered prior to 7 years of age and as dose 1, 2, or 3 series should be repeated with age-appropriate vaccine.	Inadvertent Administration.
Live vaccines not administered on same date must be separated by 28 days.	Live Virus Conflict.
HepB Pediatric/Adolescent vaccine dosage is not sufficient for patient after 19 years of age.	Invalid Administration.
Zoster live is not acceptable for this dose.	
Vaccine marked as Compromised.	Substandard.



Department of Health

Ohio Department of Health, Bureau of Infectious Diseases
ImpactSIIS Training Contacts



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419-610-5694 (cell)

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Demetris Simms

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Demetris.Simms@odh.ohio.gov



Department of Health

VFC Updates and Reminders

Reminders: McKesson Shipping Update



For refrigerated vaccine shipments and COVID vaccine shipments from McKesson.

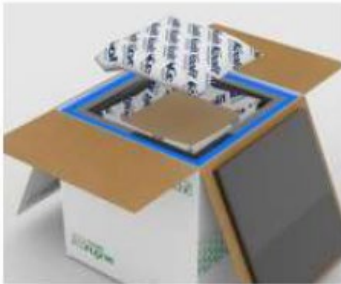
1. **IMMEDIATELY** open the cooler and follow the TagAlert instructions.
2. **Compare** the packing list to the contents of the cooler.
3. **Inspect** the vaccine.
4. **Place vaccine** in appropriate storage immediately upon receipt.

Reminders: McKesson Shipping Update



RETURN YOUR COOLER

PLEASE
RETURN COOLER
DO NOT
DISPOSE



Step 1: Open shipper and remove the top PCM gel pack(s).



Step 2: Remove the product(s) from the inner corrugated box.



Step 3: Ensure the inner corrugated box is back in the EcoFlex shipping system.



Step 4: Place the top PCM gel pack(s) back on top.



Step 5: Fold in the original outer flaps. Fold in the remaining flaps with return.



Step 6: Schedule a pickup with UPS. Contact UPS either by phone or by email.

4. Repack the cooler for refurbishing.
5. Return the cooler via UPS.



The return shipping label can be found on the inside flap of your EcoFlex box. For more information, contact info@coldchaintech.com

McKesson

Vaccine Inventory (VFC and Private)

Provider locations are required to have two separate vaccine inventories:

1. An inventory of VFC/publicly-purchased vaccines.
2. An inventory of privately-purchased vaccines.

Vaccine Inventory (VFC and Private)

1. Make sure VFC eligible patients have access to all ACIP recommended vaccines. This means ordering VFC stock of these products for age appropriate VFC eligible patients.
2. If a site serves non-VFC eligible patients, assure that you have private vaccine inventory for these patients and are not intentionally borrowing from VFC inventory.

Exception to private vaccine inventory requirement: nirsevimab and COVID-19 vaccine.

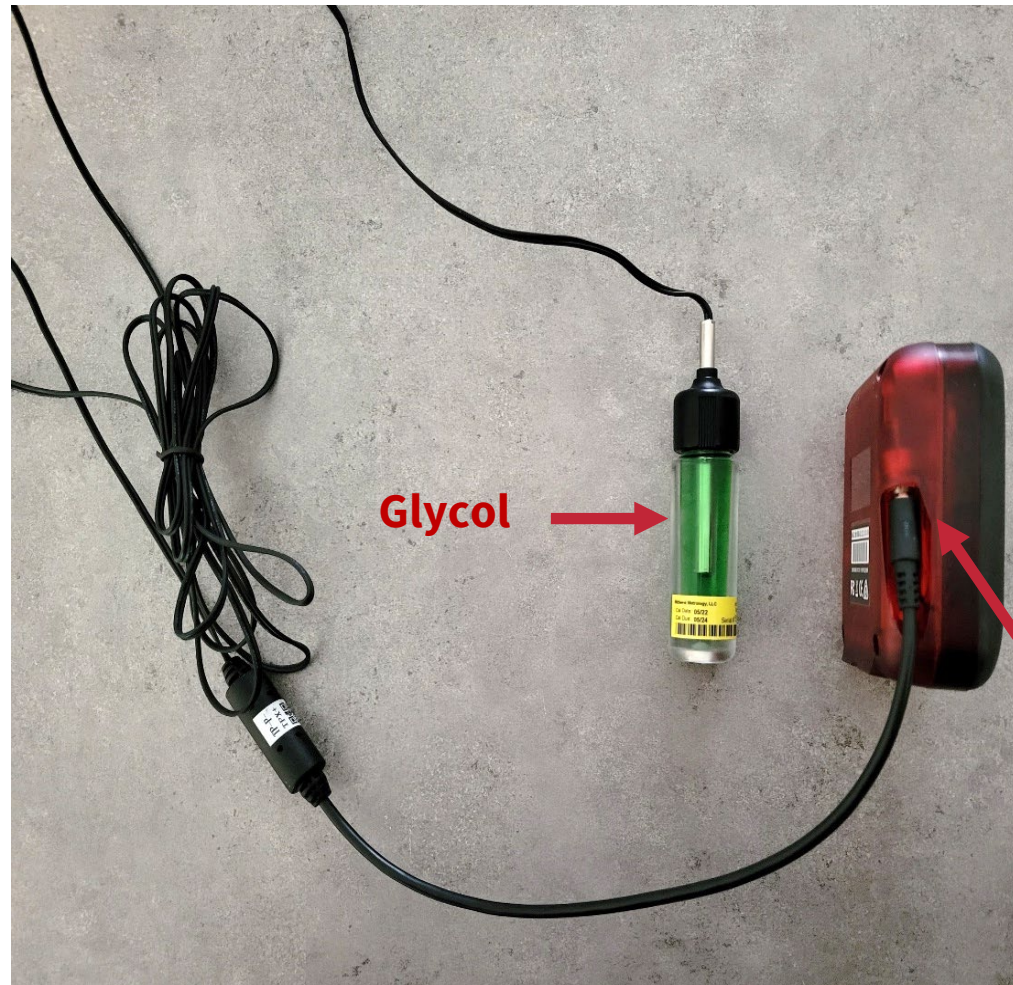
Nirsevimab and COVID Private Supply Inventory

At this time, VFC providers will be allowed a flexible, time-limited ramp-up period to meet the private inventory requirement for nirsevimab and COVID-19.

ODH will **not require** VFC providers to meet the private inventory minimum requirements for these two vaccines if providers do not intend to vaccinate their private pay (non-VFC eligible) patients with nirsevimab and COVID-19 vaccines.

- **VFC providers have until August 31, 2025, to meet the private inventory requirement.**

ODH-Supplied WIFI DDL Reminders



1. Assure the WIFI unit and glycol remain connected, even during charging. A disconnect results in a 'P Err' and no temperatures being recorded.
2. When checking and clearing the Min/Max, don't hold the function button for an extended time.

Glycol Jack

Reminders and Announcements

- Off-cycle Ordering.
- Paper temperature log availability.
- Contact ODH VFC Program if you have any VFC Coordinator staffing changes.
- Always contact the Immunization Program for approval prior to any non-emergency transport of VFC vaccine.
- Report temperature excursions via phone to the Immunization Program main line: 1-800-282-0546.

Resources

VFC Consultant Territory Map

Contact Us:

Phone:

(614) 466-4643
1-800-282-0546

Email:

vfc@odh.ohio.gov
Immunize@odh.ohio.gov
Impact@odh.ohio.gov

Webpage Resources:

[VFC Providers](#)

[ImpactSIIS Job Aids and Videos](#)

QUESTIONS?

ODH.OHIO.GOV



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