



North Macedonia

WUENIC 2024 revision,
Published 15 July 2025



WHO/UNICEF Estimates of National Immunization Coverage (WUENIC), 2024 revision

Every year, WHO and UNICEF jointly review submissions from Member States on national immunization coverage, including annual administrative and official coverage, finalized survey reports and data from both published and grey literature. The data is triangulated with consideration of potential biases and local expert opinions to differentiate between accurately reflective empirical data and potentially misleading data, to assess the most likely coverage levels for each country.

WHO and UNICEF produce country-specific estimates by individually reviewing each country's data without borrowing from other countries in the absence of data. These estimates are not based on ad hoc adjustments to reported data; sometimes, empirical data come from a single source, typically nationally reported coverage data. If no data are available for a specific country-vaccine-year combination, data from earlier and later years are considered and interpolated to fill in the gaps. When data sources are conflicting and show significant variations, efforts are made to determine the most likely estimate, taking into account potential biases in the available data.

This slide deck presents the latest WUENIC estimates (published 15 July 2025).

NA: • [Burton et al. 2009. WHO and UNICEF estimates of national infant immunization coverage: methods and processes.](#)

- [Burton et al. 2012. A formal representation of the WHO and UNICEF estimates of national immunization coverage: a computational logic approach.](#)
- [Brown et al. 2013. An introduction to the grade of confidence used to characterize uncertainty around the WHO and UNICEF estimates of national immunization coverage.](#)
- [Danovaro-Holliday et al. 2021. Compliance of WUENIC with Guidelines for Accurate and Transparent Health Estimates Reporting \(GATHER\) criteria.](#)

Definitions of immunization terms

Vaccine coverage

Percentage of infants (children under one year of age) who received certain vaccine-doses. For example, coverage of DTP3 is the percentage of infants who received all three doses of diphtheria, tetanus, and pertussis (DTP) vaccine.

Unvaccinated

An infant that did not receive the first dose of a vaccine series. The term "zero-dose" is used to describe children unvaccinated with DTP1.

Under-vaccinated

An infant who received some but not all the recommended vaccine-doses in the national schedule.

Vaccine-Doses

- Bacillus Calmette-Guerin (BCG): vaccine against tuberculosis
- Hepatitis B birth dose, given within 24 hours after birth (HepBB)
- Diphtheria, tetanus, and pertussis vaccine, first dose (DTP1) and third dose (DTP3)
- Hepatitis B vaccine, third dose (HepB3)
- *Haemophilus influenzae type b* vaccine, third dose (Hib3)
- Poliomyelitis vaccine, third dose (Polio3)
- Inactivated polio vaccine, first dose (IPV1) and second dose (IPV2): second dose is only shown for oral polio vaccine (OPV) using countries
- Measles containing vaccine, first dose (MCV1) and second dose (MCV2)
- Rotavirus vaccine, last dose (RotaC)
- Pneumococcal vaccine, third dose (PCV3)
- Yellow Fever vaccine (YFV)
- Meningococcal A vaccine (MengA)
- Human papillomavirus vaccine, first dose (HPV1) and last dose (HPVc): vaccine to protect against certain types of human papillomavirus that can lead to cancer or genital warts

The Immunization Agenda 2030 (IA2030)

The IA2030 is a global strategy endorsed by the World Health Assembly aiming to ensure everyone, everywhere, at every age benefits from vaccines for improved health and well-being by 2030. It focuses on increasing vaccine coverage, equity, sustainability and pandemic preparedness while promoting life-course immunization and integrating immunization with other health services.

Key concepts

- The World Health Organization (WHO) provides global vaccine recommendations, which are adapted by countries based on local needs. Only DTP, polio and measles-containing vaccines are used in all countries.
- DTP1 is a marker of access to routine immunization services, and when not received, serves as a proxy for identifying children who have not received any vaccinations, also known as "zero-dose" children. High DTP1 coverage indicates good access to immunization services, while low coverage suggests challenges in reaching children with essential vaccines.
- DTP3 is a widely used indicator of immunization programme performance. It reflects a country's ability to deliver routine immunization services and ensures children are protected against serious disease. DTP3 is tracked globally and serves as a key measure of a nation's vaccination efforts.
- DTP1-DTP3 drop-out measures the percentage of children who received DTP1 but not DTP3, and highlights where children are lost along the vaccination pathway, highlighting potential weaknesses in service delivery and follow-up.
- MCV1 (usually recommended between 9-12 months) assesses the ability to deliver vaccines later in infancy. It serves as a tracer for protection against measles and is a good indicator of health system performance.
- HPV vaccine protects against specific types of human papilloma virus (HPV), and is used to measure life cycle vaccination.
- Other key indicators include PCV3 and MCV2, which are used to monitor the Sustainable Development Goals (SDGs).
- Together, these indicators provide a consistent and comparable way to track immunization progress, identify missed communities and monitor global targets, including those under the Immunization Agenda 2030 (IA2030) and Sustainable Development Goals (SDGs).

Key messages

- DTP1 coverage increased 1 percentage point from 92% in 2023 to 93% in 2024.
- DTP3 coverage increased 3 percentage points from 86% in 2023 to 89% in 2024.
- There were there were approximately the same number of zero-dose children in 2024. This leaves 1,000 children without vaccination, vulnerable to vaccine-preventable diseases and a further <1,000 with incomplete protection.
- North Macedonia accounted for 0.5% of zero-dose children in Europe and Central Asia (ECAR) and <0.1% of zero-dose children globally.
- MCV1 coverage remained constant at 73% between 2023 and 2024. There were 4,000 children who missed out on the first measles vaccination.
- MCV2 coverage declined 9 percentage points from 88% in 2023 to 79% in 2024.
- Last dose coverage of HPV vaccination (HPVc) among girls decreased from 42% to 40% in 2024.

Vaccination schedule, 2024

Level	Vaccine	Dose number and age administered			
		1	3	2	4
National	BCG	Birth			
National	DTAPHIBHEPBIPV	2 months	6 months		
National	DTAPHIBIPV			4 months	
National	DTAPHIBIPV (booster)				18 months
National	HEPB (pediatric)	Birth			
National	HPV (females)	12 years		+6 months	
National	HPV (females and males)	12 years		+6 months	
National	MMR	12 months		6 years	
National	PCV	2 months	12 months	4 months	
National	Rotavirus	2 months	6 months	4 months	

This table shows the 2024 national immunization schedule for routine services in North Macedonia, reported through the WHO/UNICEF Joint Reporting Form on Immunization (JRF).

Each row corresponds to a vaccine or combination vaccine, indicating whether it is delivered at the national or subnational level. The schedule outlines the number of doses and the recommended ages for administration. Only childhood and adolescent vaccines relevant to WUENIC are included.

Vaccine introduction years

Vaccine	National introduction
HPV (Human Papilloma Virus) vaccine	2009
HepB birth dose	2004
Hepatitis B vaccine	2004
Hib (Haemophilus influenzae type B) vaccine	2008
IPV (Inactivated polio vaccine)	2015
IPV (Inactivated polio vaccine) 2nd dose	2015
Malaria vaccine	Not introduced
Measles-containing vaccine 2nd dose	1993
Meningococcal meningitis vaccines (all strains)	Not introduced
Mumps vaccine	1995
PCV (Pneumococcal conjugate vaccine)	2019
Rotavirus vaccine	2019
Rubella vaccine	1993
YF (Yellow fever) vaccine	Not introduced

This table displays the year each vaccine was introduced in North Macedonia. If a vaccine has been suspended, no introduction year is shown, but if it was suspended and later reintroduced, the year of reintroduction is provided. The introduction years can reflect nationwide rollout, partial (subnational) rollout, or introduction targeted to specific risk groups or high-risk areas, as indicated in the column headers.

Vaccine stockouts

Vaccines / supplies	2021
HPV	National (6m) and subnational
HepB	National (6m) and subnational

This table presents reported vaccine stockouts of childhood vaccines relevant to WUENIC at the national and subnational levels over the last 5 years (2020 to 2024). Where available, the duration of national-level stockouts is indicated in months. Subnational stockouts are noted without specifying duration. Only vaccines that had a stockout during the specified time period are displayed.

A stockout refers to a period when vaccine storage and distribution points (e.g., national or district stores) are fully depleted, including buffer stock, and are unable to supply vaccines to lower-level stores or facilities. It is important to note that facility-level stockouts can still occur even when upper-level stores have inventory. Stockouts, especially prolonged ones, can negatively impact immunization coverage.

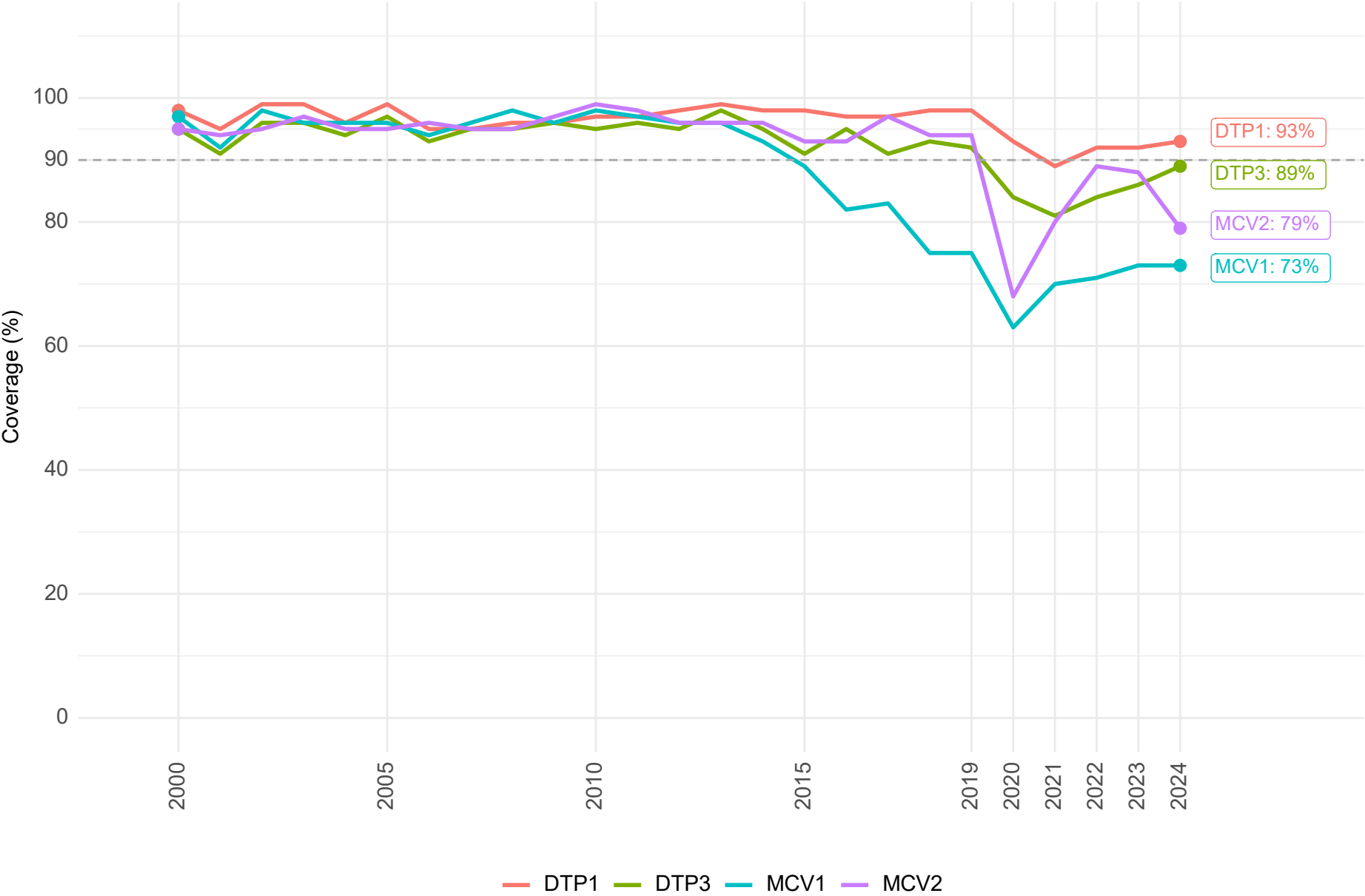
Vaccine coverage, North Macedonia, 2000-2024



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision.
Note: Stock information available from 2003.
An asterisk (*) indicates where there was a vaccine stockout at the national or subnational level.

This heatmap shows trends in vaccine coverage since 2000, with green cells indicating coverage of 90% or more.

Coverage of key childhood vaccines (%), North Macedonia, 2000-2024



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision

This chart shows coverage trends for the DTP and measles vaccines. These are key antigens for assessing national immunization programmes.

In 2024, DTP1 coverage (a proxy for access to immunization services) was 73%.

DTP3 coverage - a marker of how well countries are delivering immunization services to children - fell short of, but was close to the 90% target.

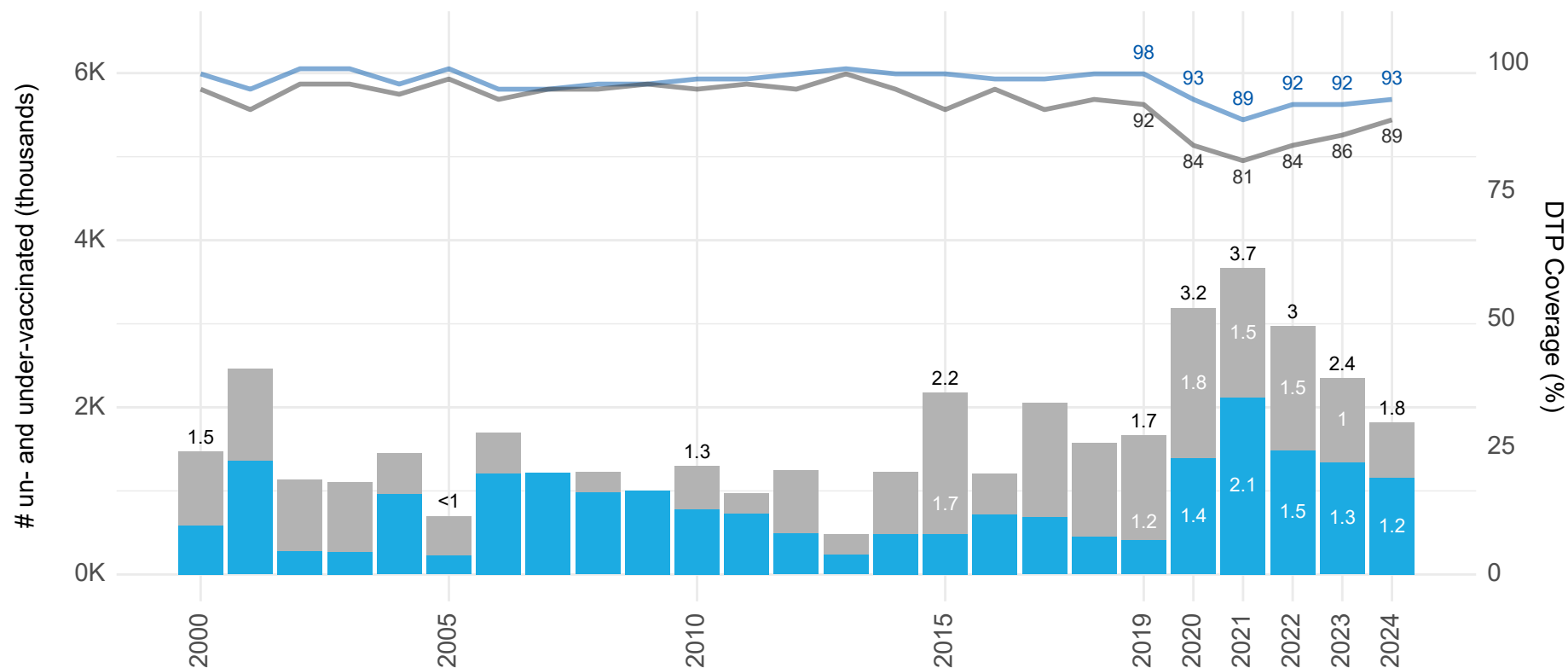
WHO recommends that countries achieve at least 95% coverage with both the first (MCV1) and second (MCV2) doses of measles-containing vaccine. MCV1 provides initial protection and MCV2 ensures long-term immunity and closes gaps in coverage.

In 2024, MCV1 coverage was below the 95% target and MCV2 coverage was below the 95% target.

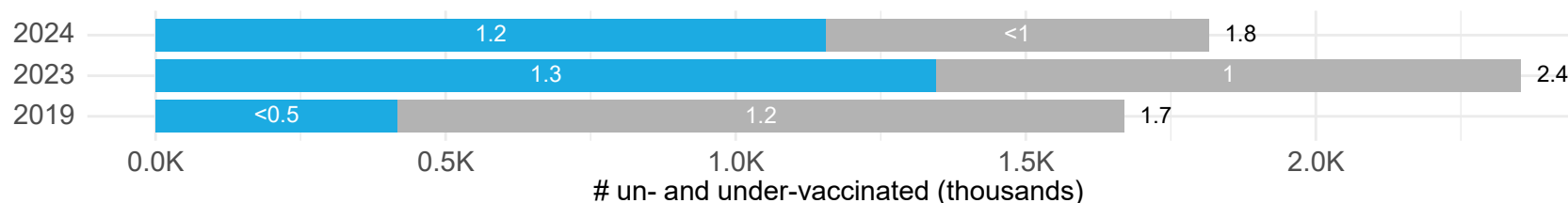
Between 2023 and 2024, 2 vaccines increased coverage, 1 declined and 1 remained the same.

DTP1

Estimated coverage and number of un- and under-vaccinated children for DTP, North Macedonia, 2000-2024



— DTP1 — DTP3 ■ Drop-out ■ Zero-dose



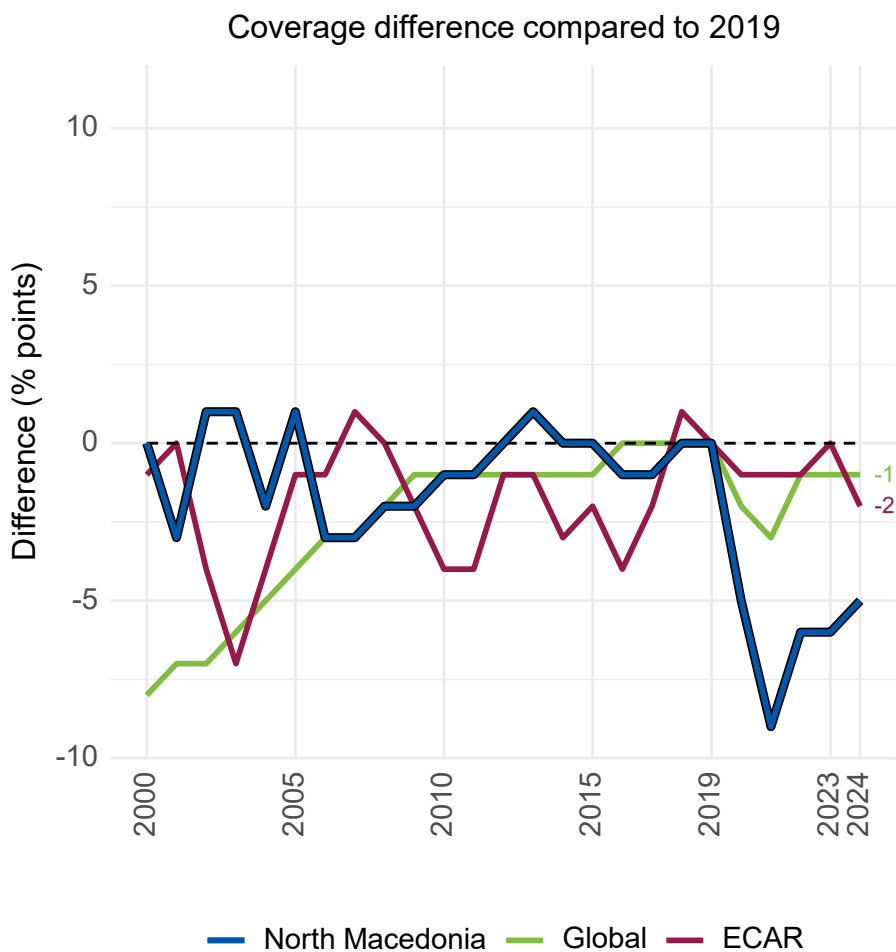
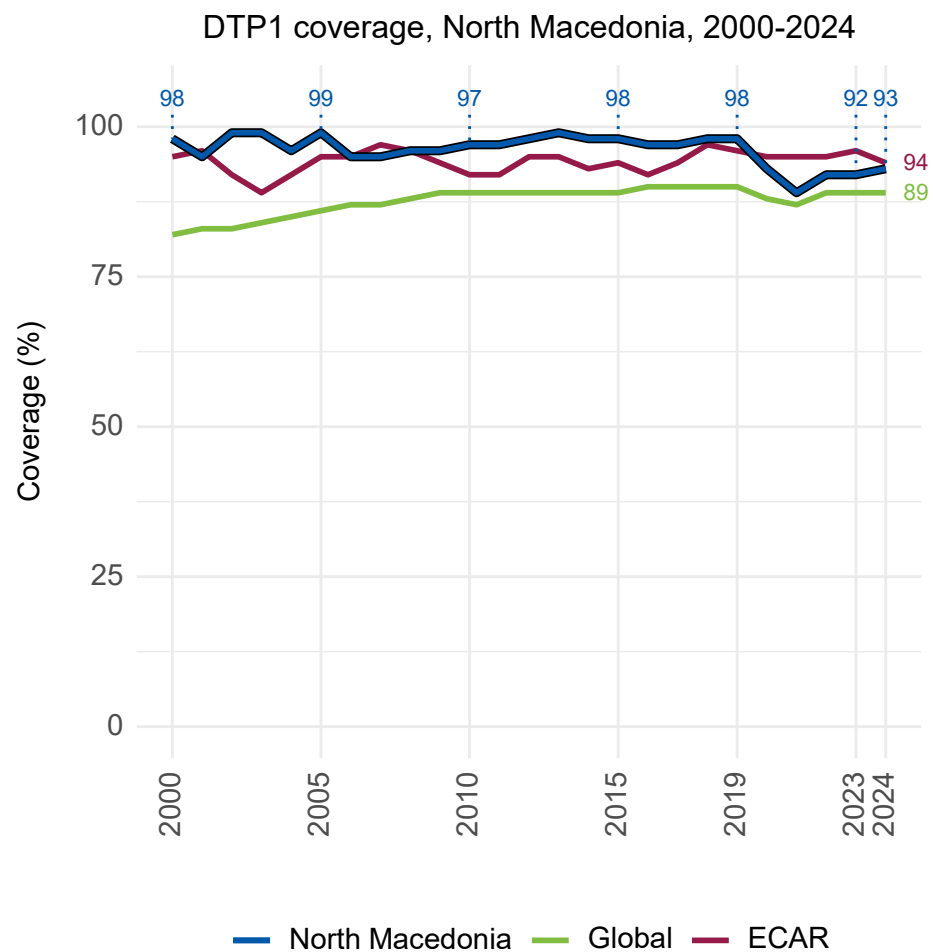
Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
 Note: Lines show vaccine coverage and bars show number of children.
 Zero-dose children are those who did not receive DTP1.

The key goal of the Immunization Agenda 2030 is to make vaccination available to everyone, everywhere, by 2030.

This chart shows diphtheria, tetanus and pertussis-containing vaccine first (DTP1) and third dose (DTP3) coverage trends, the number of zero-dose children and DTP drop-out in North Macedonia.

In 2024, DTP1 coverage in North Macedonia remained relatively constant within 1% at 93%. The number of children missing out on any DTP vaccination (zero-dose children) remained constant at from 1,000 in 2023 to 1,000 in 2024.

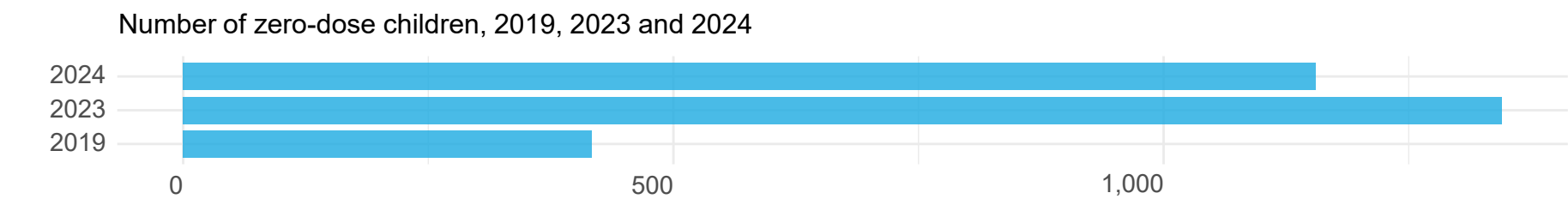
DTP3 coverage increased to 89% in 2024, leaving 2,000 children vulnerable to vaccine-preventable diseases.



In 2024, DTP1 coverage in North Macedonia (93%) was 4 percentage points higher than the global average (89%) and 1 percentage point lower than the average across all ECAR countries (94%).

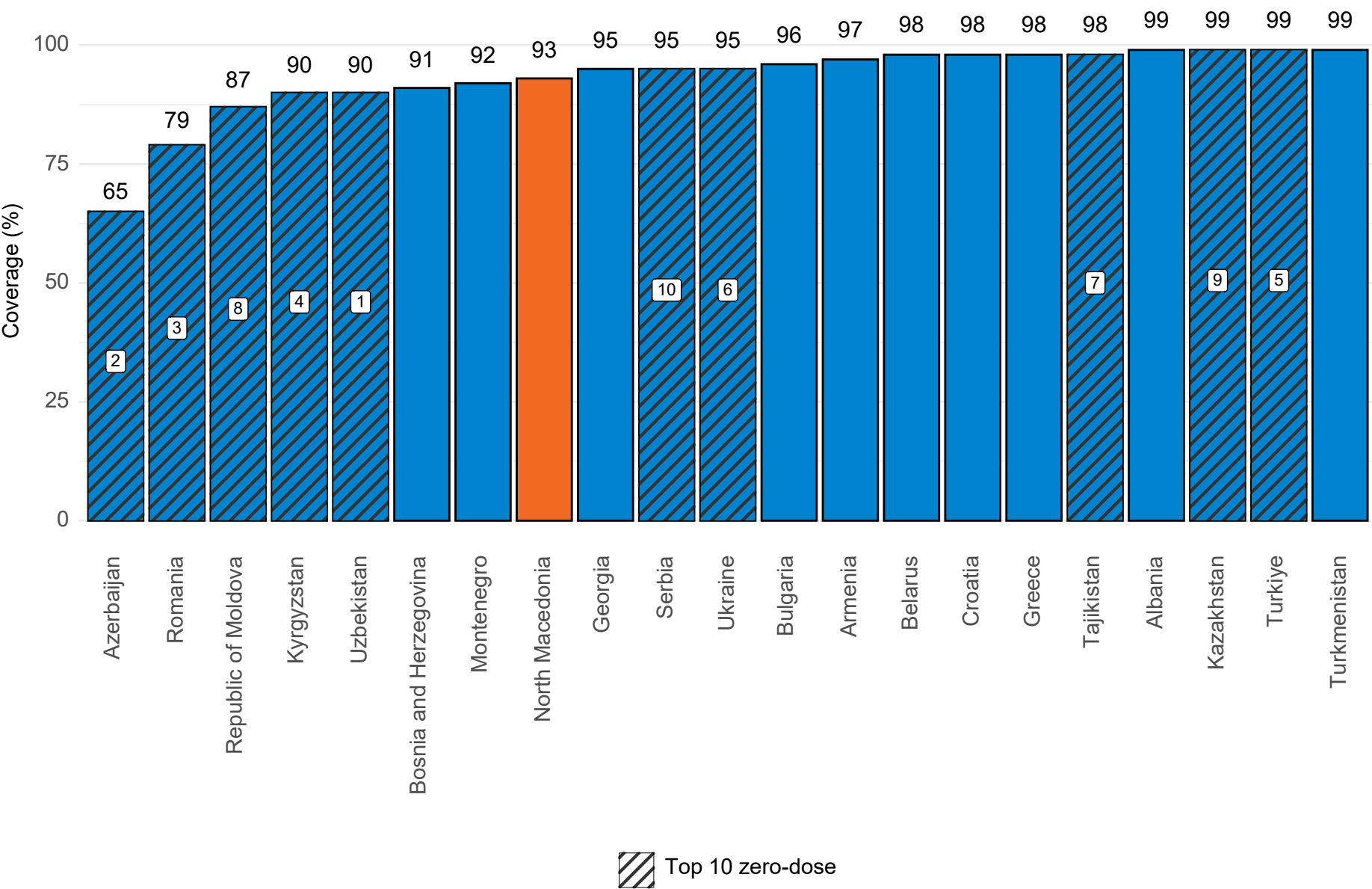
National DTP1 coverage was 5 percentage points lower than in 2019 (98%).

This equates to 1,000 zero-dose children in 2024 compared to <500 zero-dose children in 2019.



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
 Note: Coverage difference compared to 2019 - values above zero indicate coverage higher than in 2019 and values below zero indicate coverage lower than in 2019

DTP1 coverage and ranking of number zero-dose, by country, ECAR, 2024



This chart shows DTP1 coverage in countries in ECAR from lowest to highest coverage, and the rank of the top 10 countries with the most zero-dose children, based on absolute numbers.

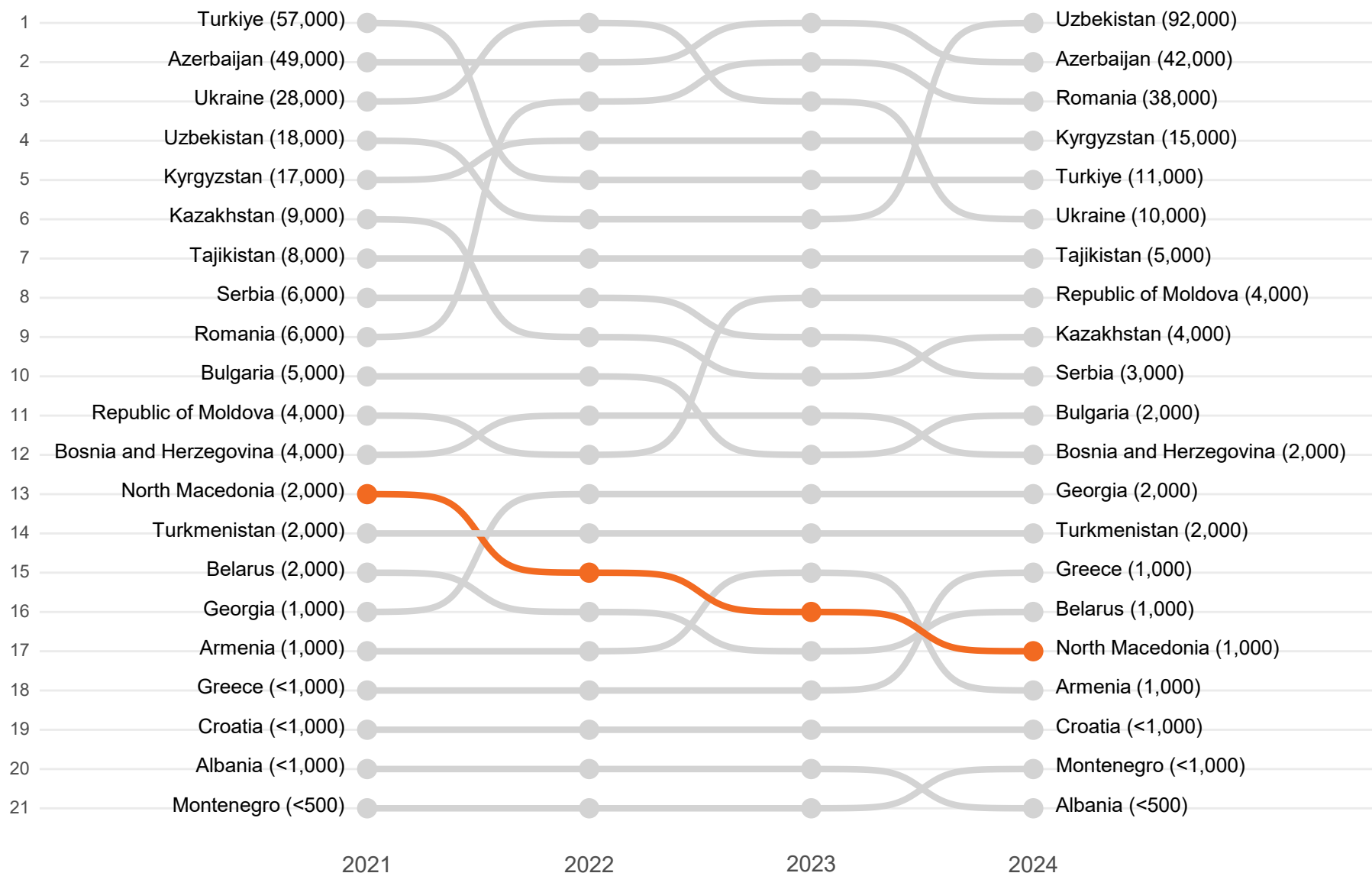
In 2024, North Macedonia ranked number 8 out of 21 countries for lowest DTP1 coverage (based on tied ranks).

North Macedonia was not in the top 10 countries with the most zero-dose children.

Note: Large cohort countries may have high numbers of zero-dose children despite high vaccine coverage. It is important to consider both coverage and absolute numbers of unvaccinated children to ensure vulnerable countries with small birth cohorts are not overlooked.

Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
Note: Bars are ranked by ascending coverage. Numbers in bubbles display top 10 rank based on absolute number of zero-dose children.

Countries ranked by number of zero-dose children, ECAR, 2021-2024



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
 Note: Number in parentheses is the number of zero-dose children.

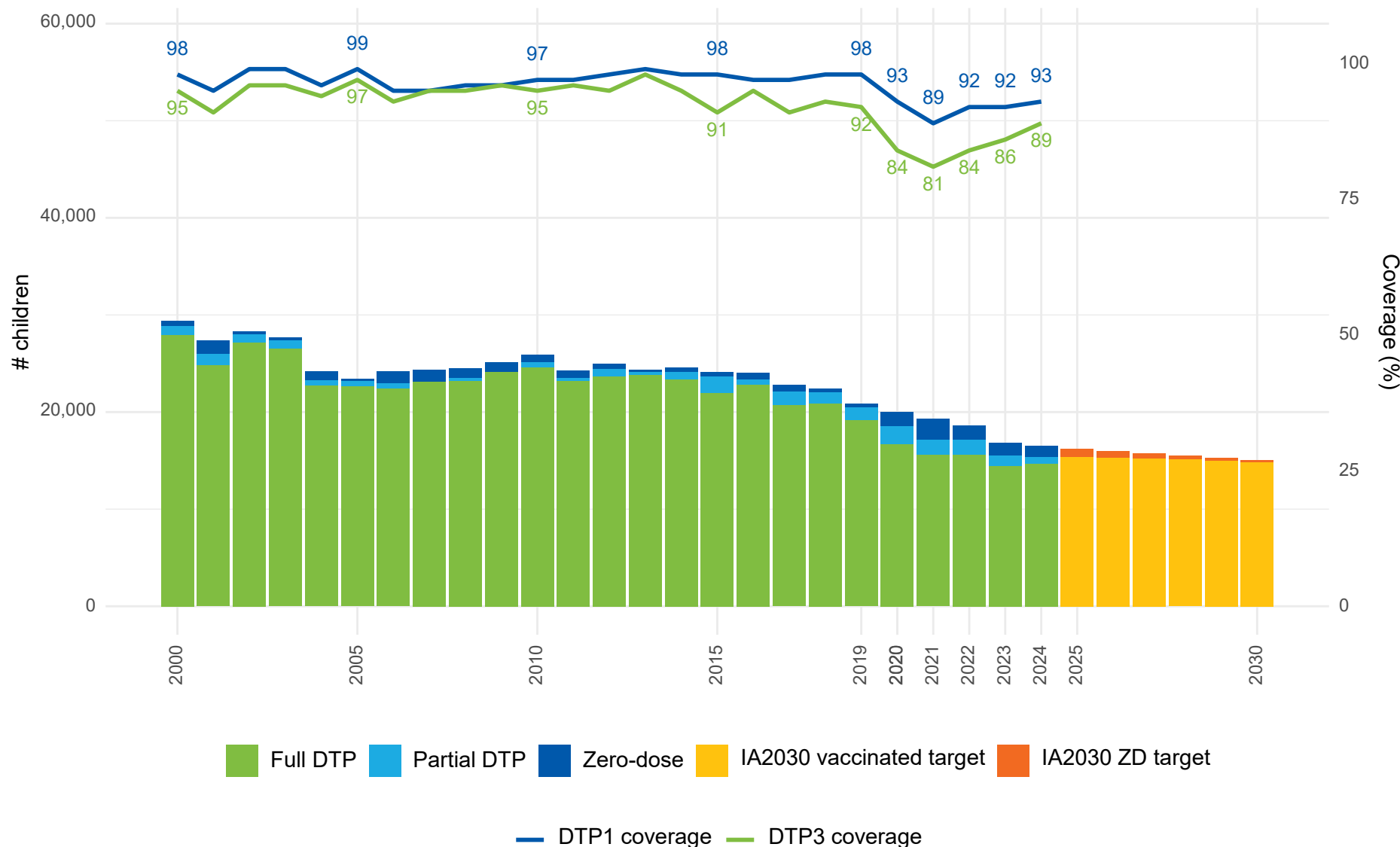
This chart compares the ranking of countries in ECAR based on the absolute number of zero-dose children, with rank 1 representing the country with the most zero-dose children.

In 2021, North Macedonia ranked number 13 out of 21 countries with 2,000 zero-dose children.

In 2024, North Macedonia ranked number 17 out of 21 countries with 1,000 zero-dose children.

Note: Absolute numbers of zero-dose children is based on a combination of programme performance and surviving infant target population size. Countries may climb to a higher rank despite a decline in number of zero-dose children as the ranking also depends on performance of other countries in the region.

DTP coverage (%), number of children fully, partially and unvaccinated for DTP 2000-2024 and projections to 2030 based on IA2030 target , North Macedonia



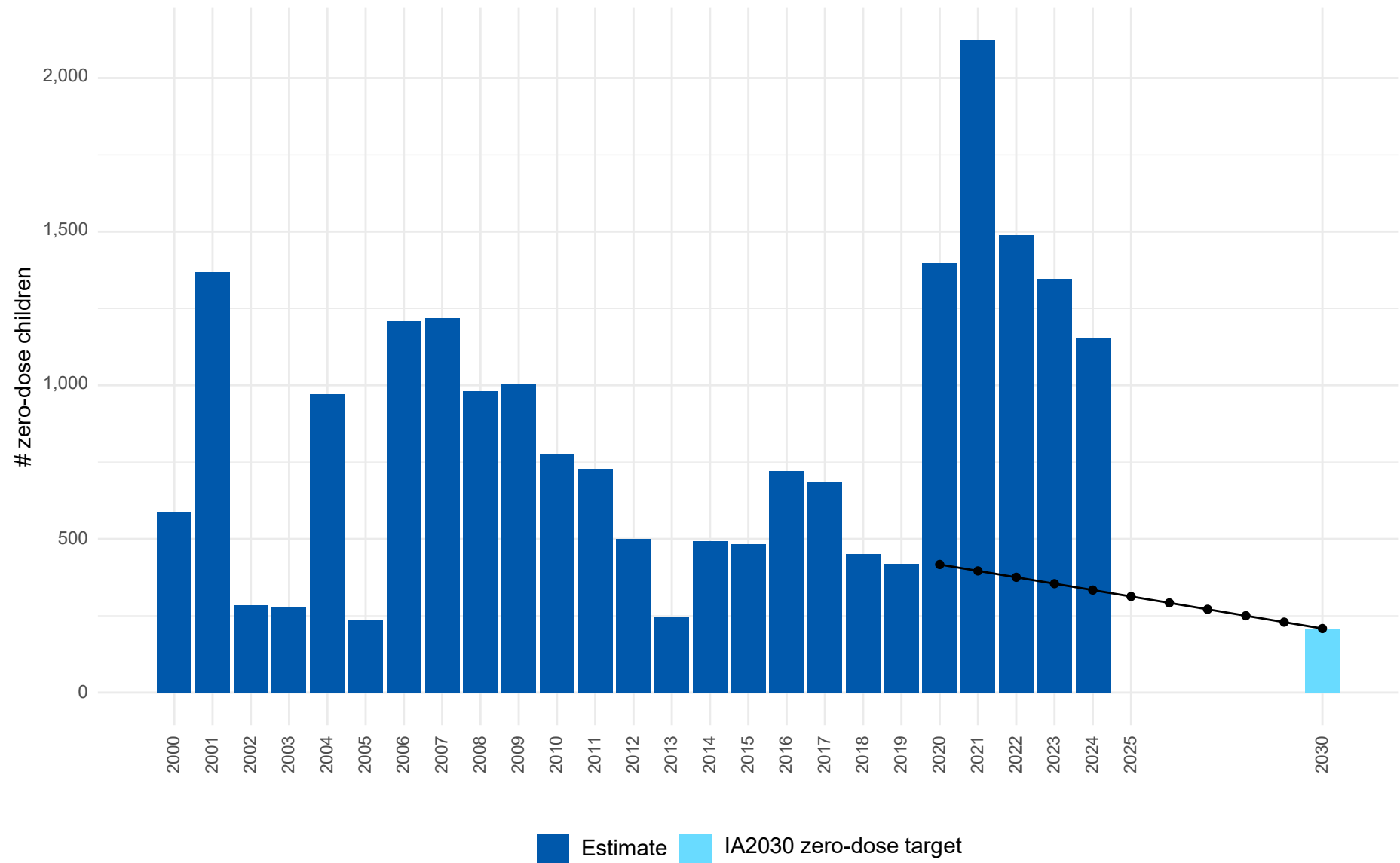
Sources: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision; United Nations, Department of Economic and Social Affairs, Population Division (2024). World Population Prospects 2024, Online Edition.
Note: The Immunization Agenda 2030 (IA2030) calls on all countries to reduce the number of zero dose children in 2019 by half by 2030.

IA2030 calls on all countries to reduce the number of zero dose children in 2019 by half by 2030. This chart shows the annual number of children required to be vaccinated to reach the ZD target.

IA2030 calls on all countries to reduce the number of zero dose children in 2019 by half by 2030. This chart shows the annual number of children required to be vaccinated to reach the ZD target.

North Macedonia is projected to have a decline in the number of surviving infants by 2030. To achieve the IA2030 ZD target, current efforts would be sufficient, however, countries must strengthen beyond the targets.

Estimated number of zero-dose children, 2000-2024 and target by 2030, North Macedonia



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
Note: The Immunization Agenda 2030 (IA2030) calls on all countries to reduce the number of zero dose children in 2019 by half by 2030. Dark blue bars are the estimated number of zero-dose children in 2000-2024, light blue bar is the target number of zero-dose children by 2030. The line and points show the yearly progress and trajectory to meet the target by 2030, based on a linear decline.

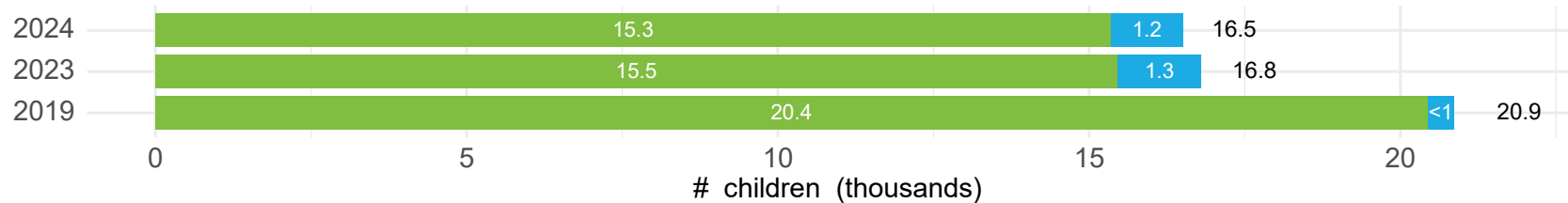
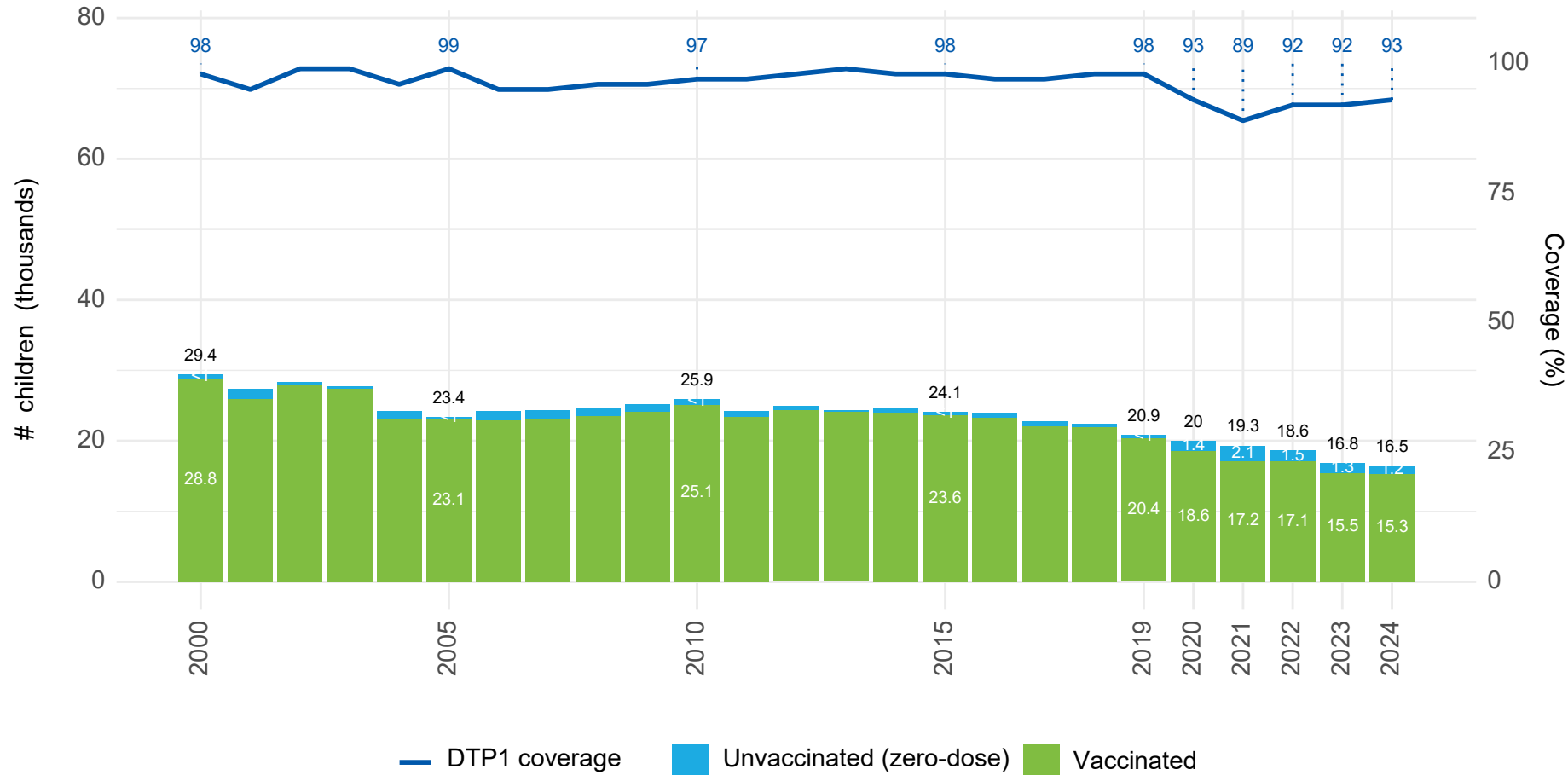
IA2030 aims to leave no one behind with immunization and calls on all countries to reduce the number of zero dose children by half by 2030.

- This chart shows:
- Estimated number of zero-dose children in 2000-2024 (dark blue bars)
 - Zero-dose target by 2030 (light blue bar)
 - Trajectory to reach the 2030 target based on a linear decline (points)

In 2024, the number of zero-dose children was approximately 246% higher than the annual number proposed to reach the target, based on a linear trajectory of decline.



Estimated DTP1 coverage, and number of vaccinated and unvaccinated children, North Macedonia, 2000-2024



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision

DTP1 coverage in 2024 (93%) was lower than in 2019 (98%).

The number of children vaccinated with DTP1 decreased 25% compared to in 2019.

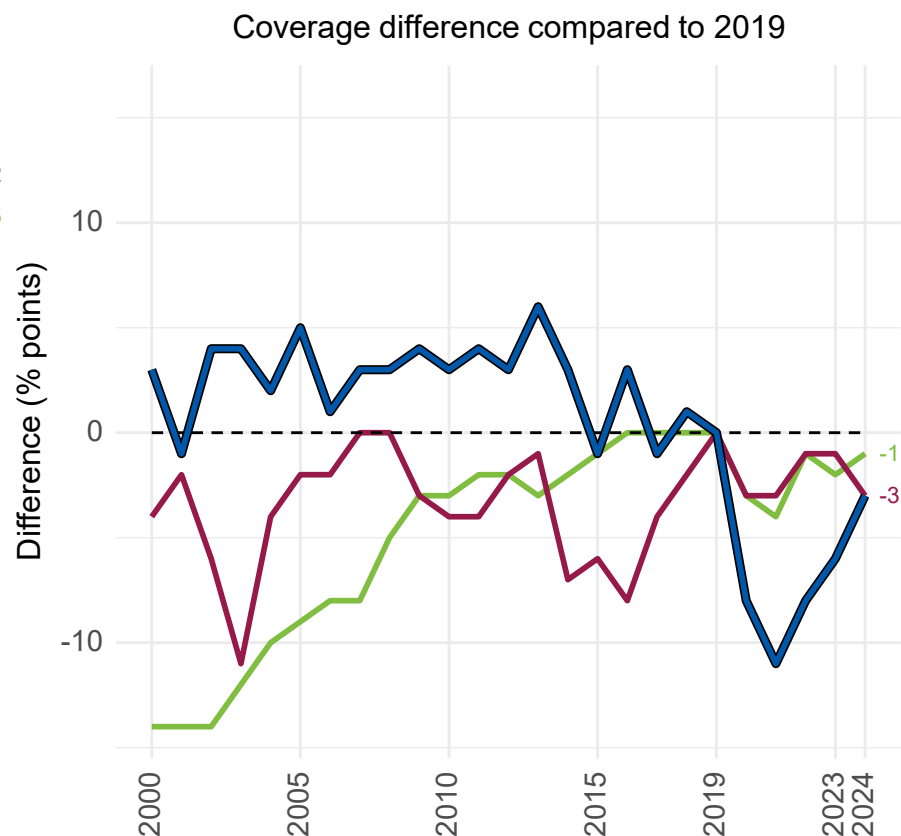
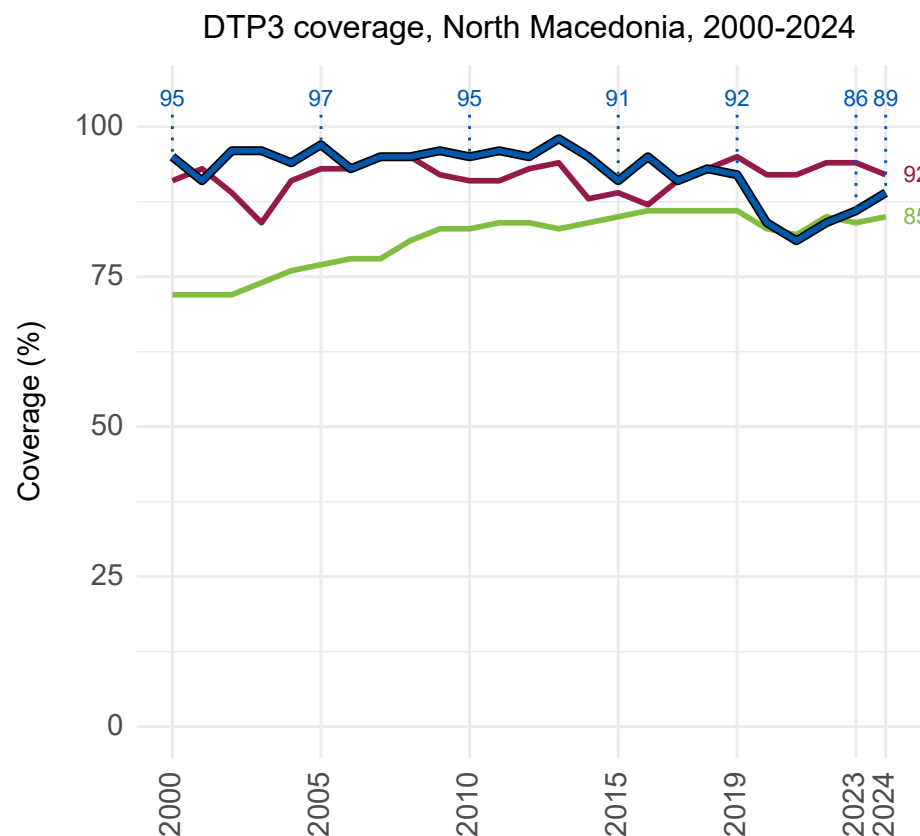
The number of surviving infants decreased approximately 21% compared to in 2019.

In 2024, fewer children were vaccinated than in 2019.

In 2024, there were fewer surviving infants (target population) than in 2019.

For vaccine coverage to increase, the number of children vaccinated needs to either increase or decline at a slower rate than the decline in surviving infant target population.

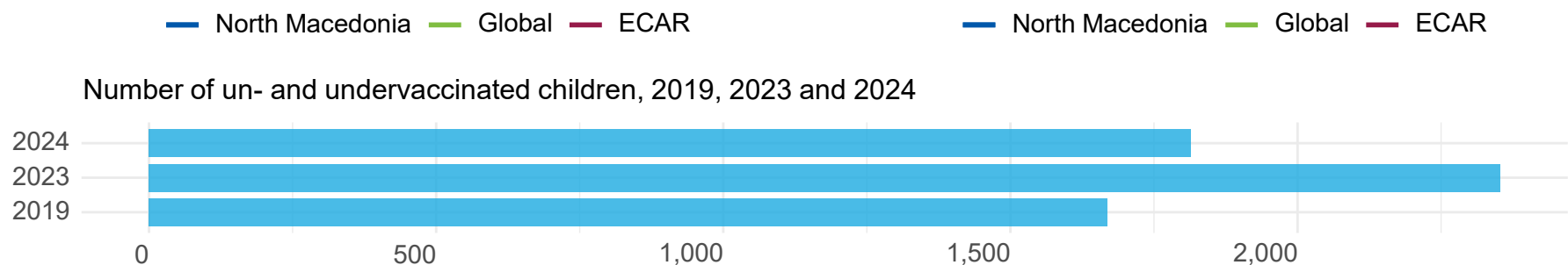
DTP3



In 2024, DTP3 coverage in North Macedonia (89%) was 4 percentage points higher than the global average (85%) and 3 percentage points lower than the average across all ECAR countries (92%).

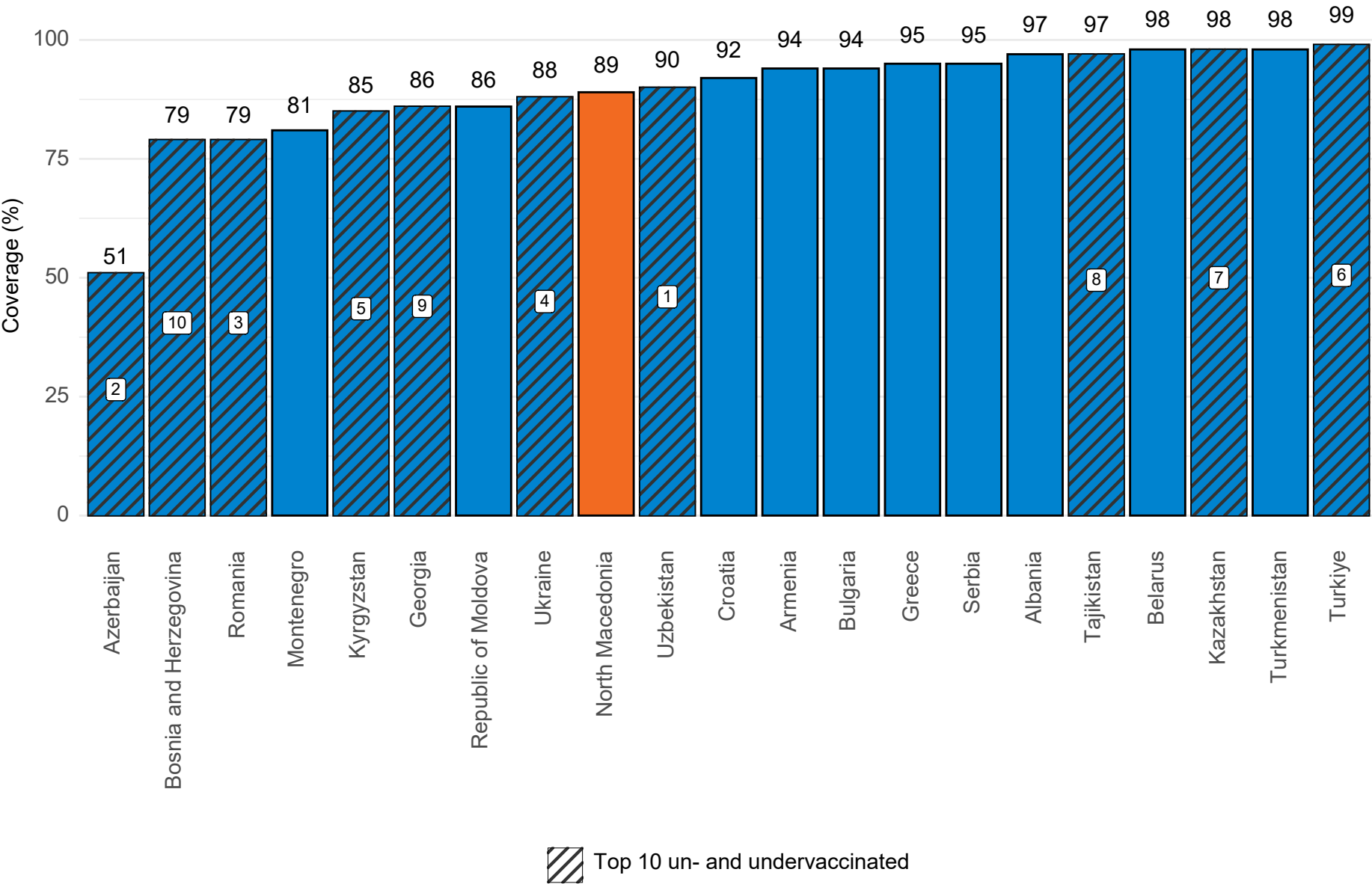
National DTP3 coverage was 3 percentage points lower than in 2019 (92%).

This equates to 2,000 un- and undervaccinated children in 2024 - the same number of un- and undervaccinated children as in 2019.



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
 Note: Coverage difference compared to 2019 - values above zero indicate coverage higher than in 2019 and values below zero indicate coverage lower than in 2019

DTP3 coverage and ranking of number un- and undervaccinated, by country, ECAR, 2024



This chart shows DTP3 coverage in countries in ECAR from lowest to highest coverage, and the rank of the top 10 countries with the most un- and undervaccinated children, based on absolute numbers.

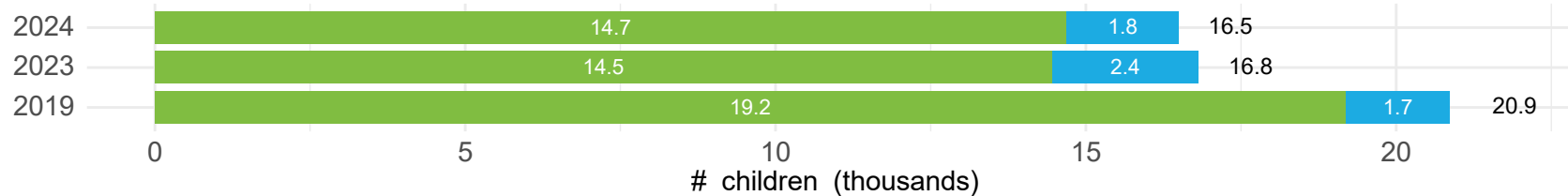
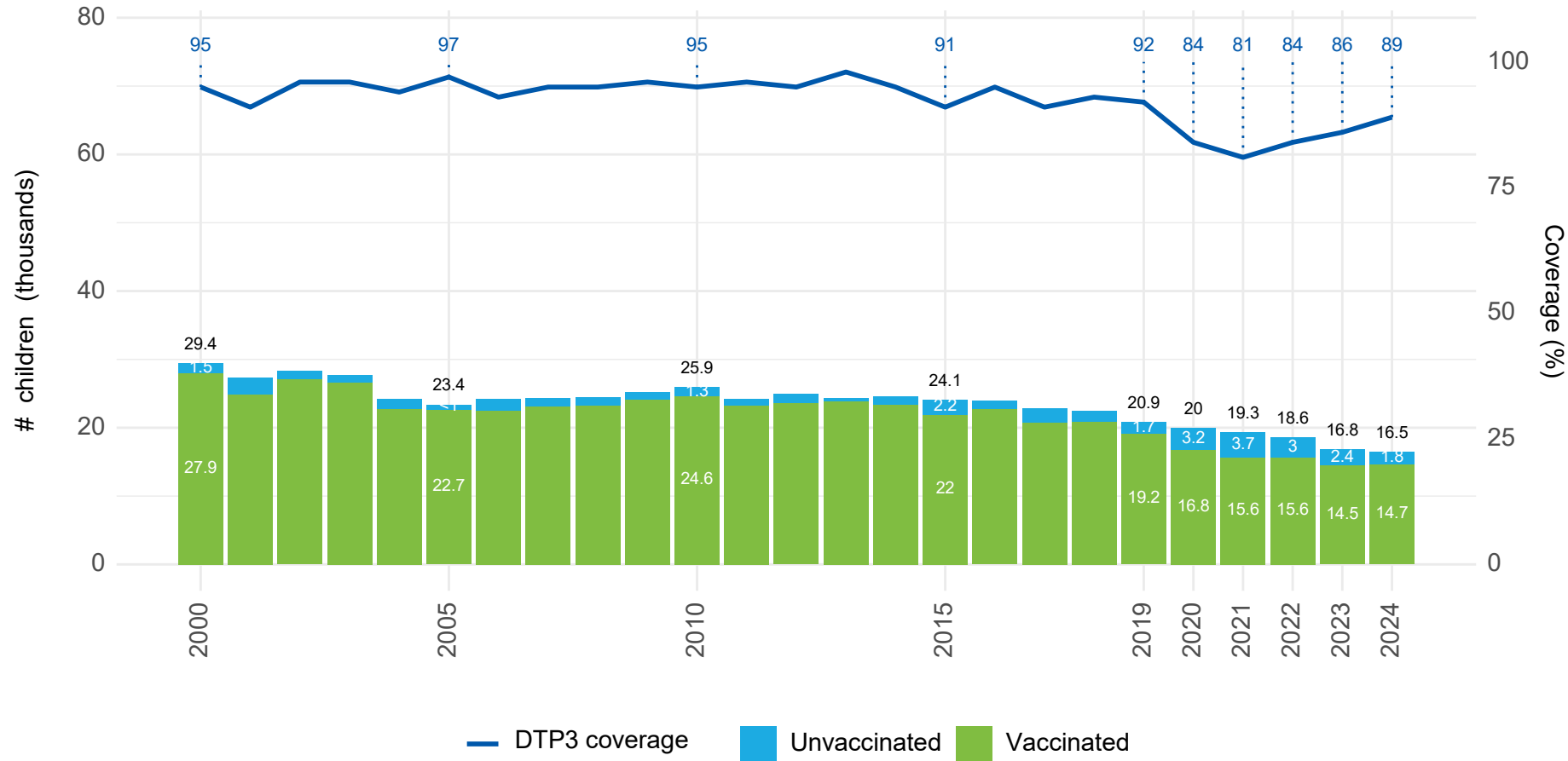
In 2024, North Macedonia ranked number 9 out of 21 countries for lowest DTP3 coverage (based on tied ranks).

North Macedonia was not in the top 10 countries with the most un- and undervaccinated children.

Note: Large cohort countries may have high numbers of un- and undervaccinated children despite high vaccine coverage. It is important to consider both coverage and absolute numbers of unvaccinated children to ensure vulnerable countries with small birth cohorts are not overlooked.

Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
Note: Bars are ranked by ascending coverage. Numbers in bubbles display top 10 rank based on absolute number of un- and undervaccinated children.

Estimated DTP3 coverage, and number of vaccinated and unvaccinated children, North Macedonia, 2000-2024



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
Note: Unvaccinated includes zero-dose and undervaccinated children

DTP3 coverage in 2024 (89%) was lower than in 2019 (92%).

The number of children vaccinated with DTP3 decreased 23% compared to in 2019.

The number of surviving infants decreased approximately 21% compared to in 2019.

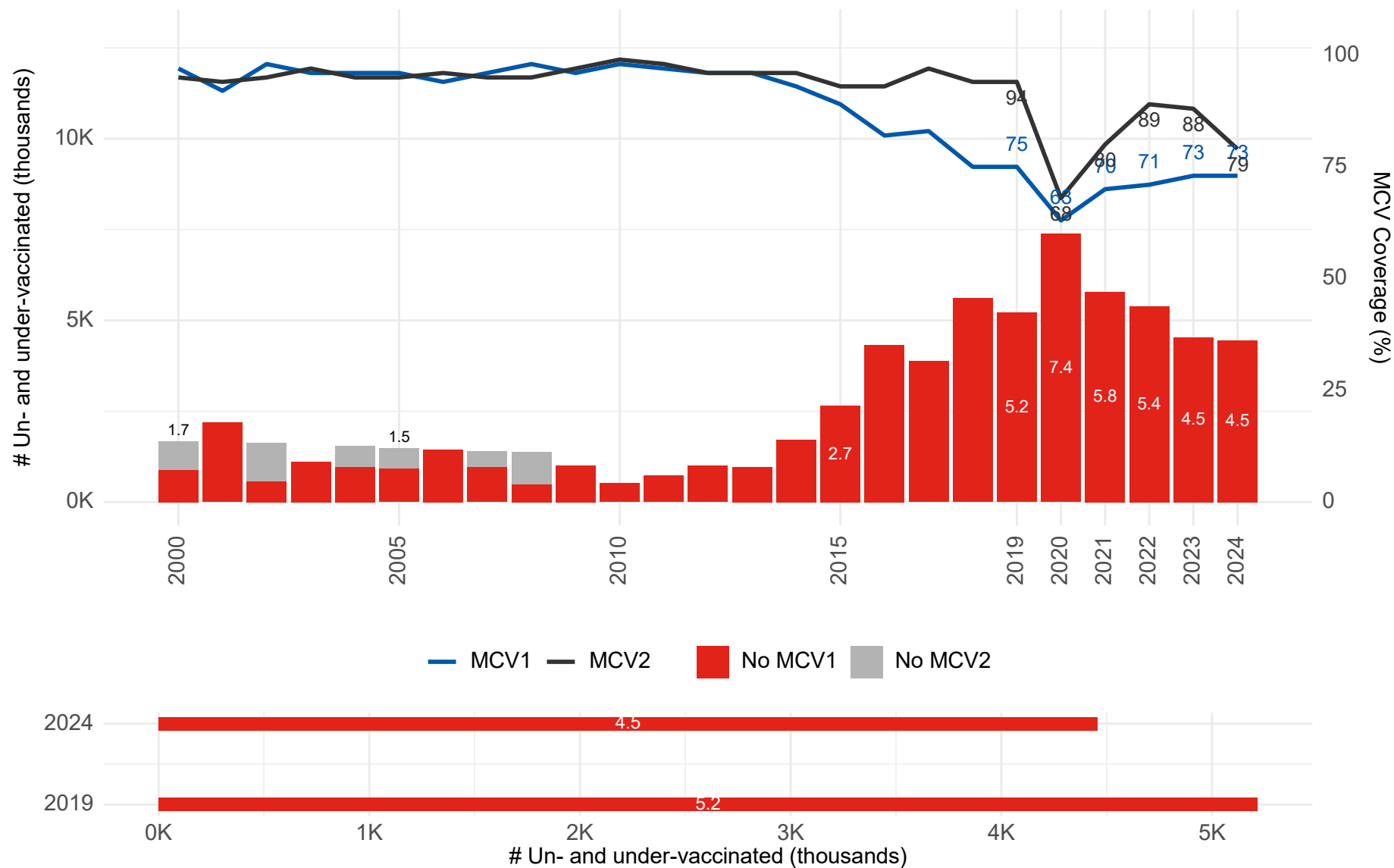
In 2024, fewer children were vaccinated than in 2019.

In 2024, there were fewer surviving infants (target population) than in 2019.

For vaccine coverage to increase, the number of children vaccinated needs to either increase or decline at a slower rate than the decline in surviving infant target population.

MCV1

Estimated coverage and number of un- and under-vaccinated children for MCV, North Macedonia, 2000-2024



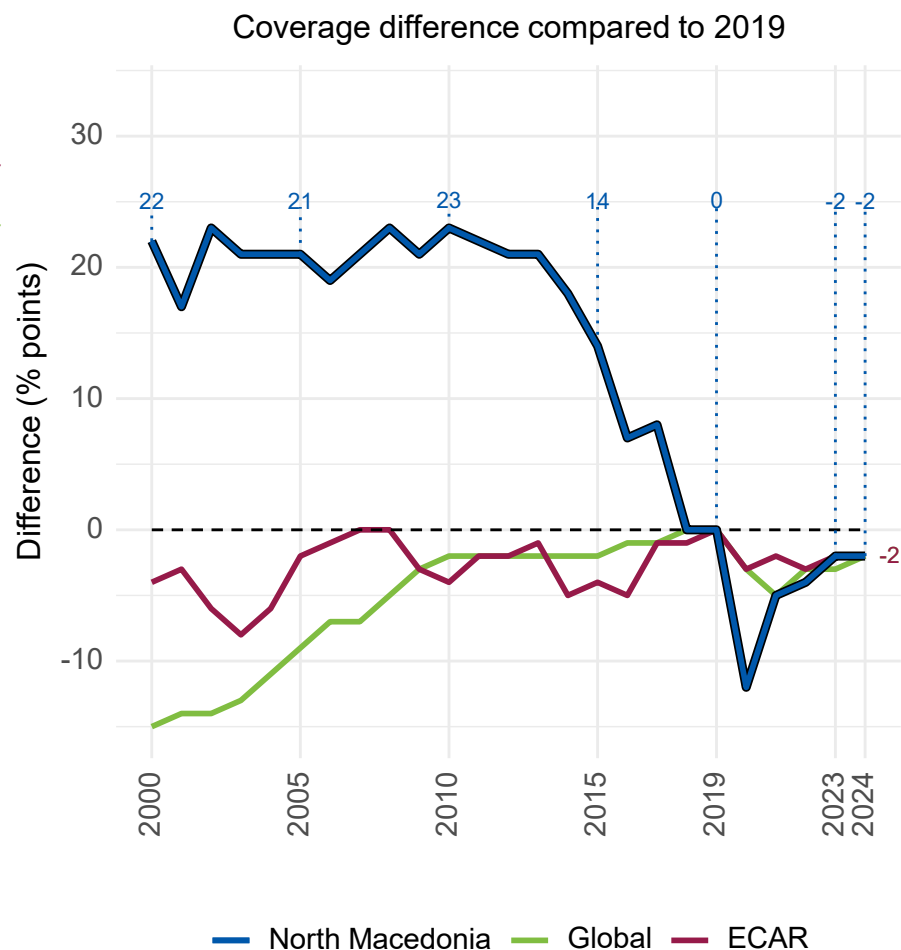
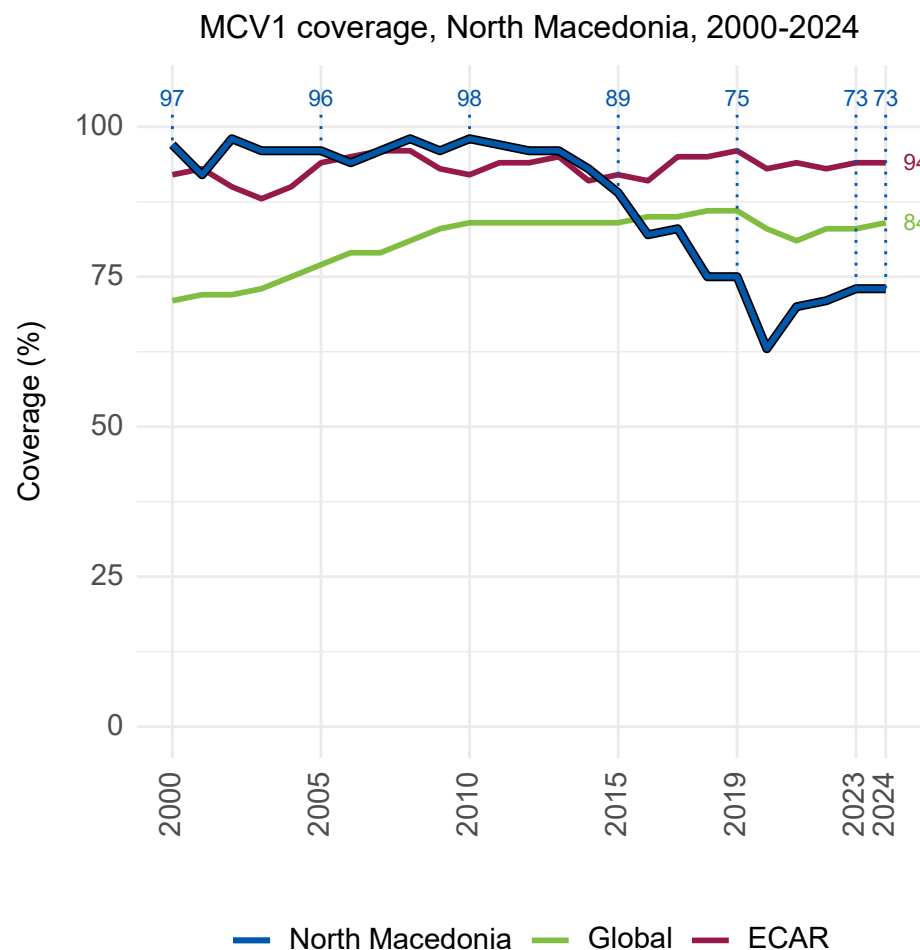
Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
Note: Lines show vaccine coverage and bars show number of children.

Measles, because of its high transmissibility, acts as a 'canary in the coalmine', quickly exposing any immunity gaps in the population. The coverage of measles containing vaccine (MCV) is thus often used as a tracer for protection.

The percentage of children receiving MCV1 – typically at 9 or 12 months depending on the national vaccination schedule – remained constant at 73%. This is lower than in 2019, where coverage was 75%.

4,000 children missed their routine first dose of measles vaccine.

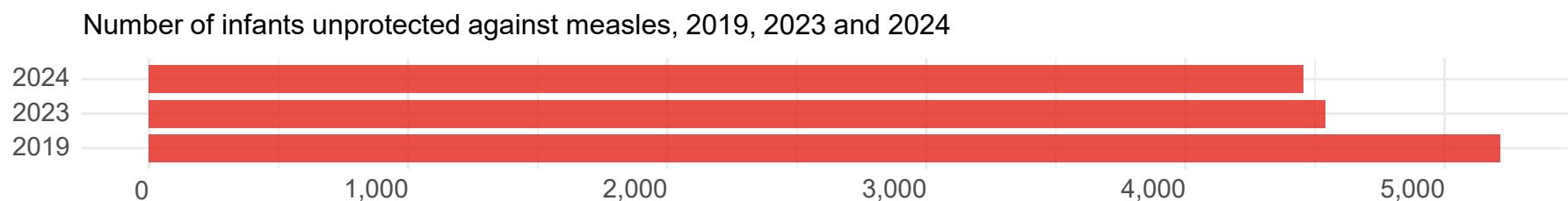
MCV2 is typically administered to children between 18 months and five years old. MCV2 coverage declined at 79% in 2024.



In 2024, MCV1 coverage in North Macedonia (73%) was 11 percentage points lower than the global average (84%) and 21 percentage points lower than the average across all ECAR countries (94%).

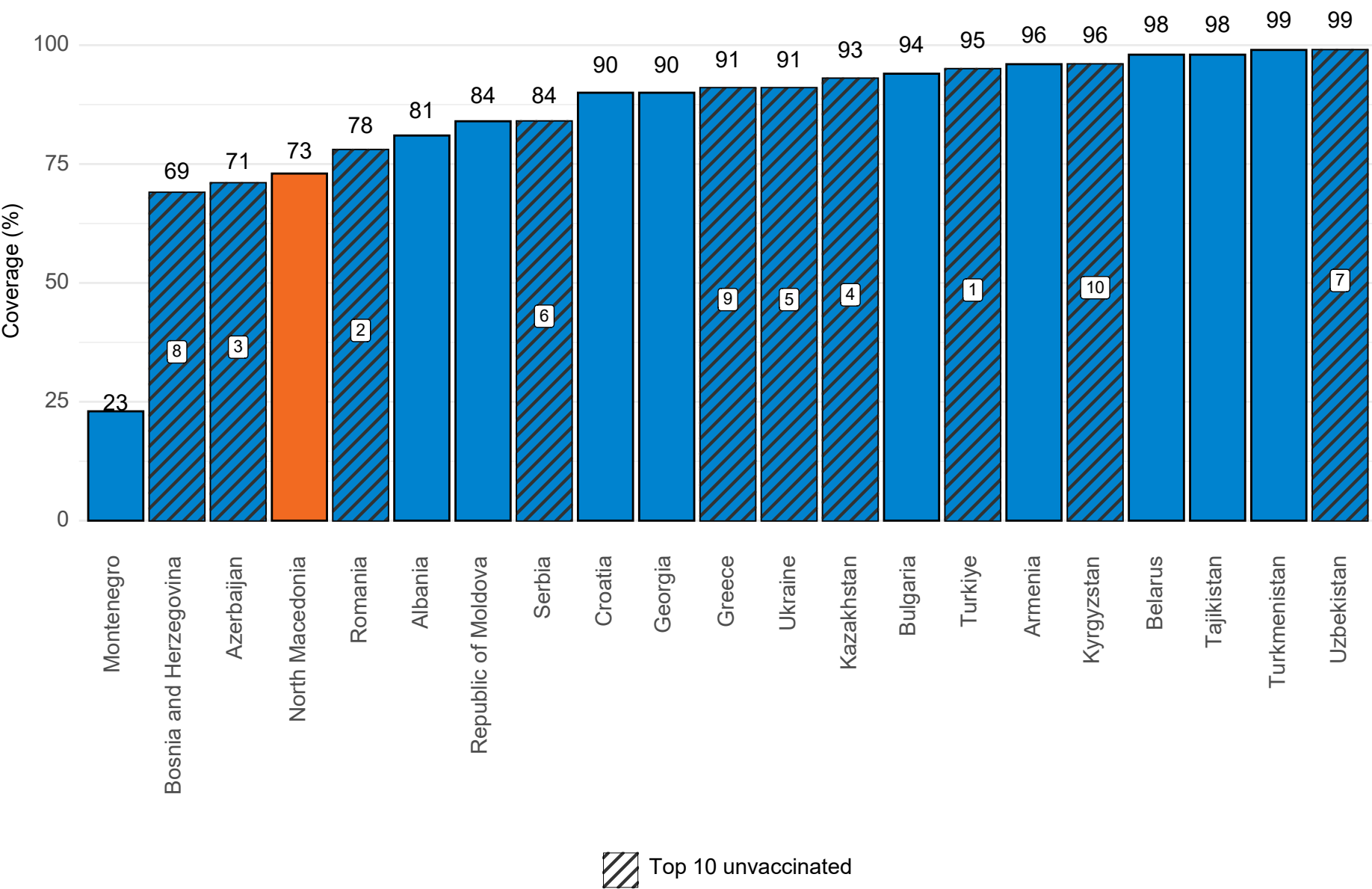
National MCV1 coverage was 2 percentage points lower than in 2019 (75%).

This equates to 4,000 unvaccinated children in 2024 compared to 5,000 unvaccinated children in 2019.



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
 Note: Coverage difference compared to 2019 - values above zero indicate coverage higher than in 2019 and values below zero indicate coverage lower than in 2019

MCV1 coverage and ranking of number unvaccinated, by country, ECAR, 2024



This chart shows MCV1 coverage in countries in ECAR from lowest to highest coverage, and the rank of the top 10 countries with the most unvaccinated children, based on absolute numbers.

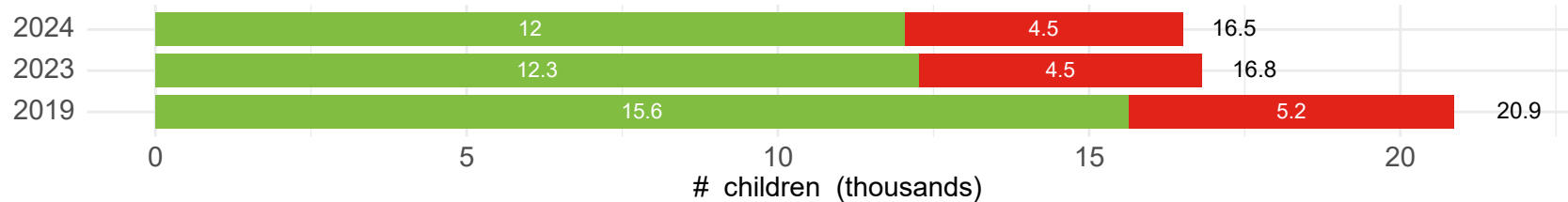
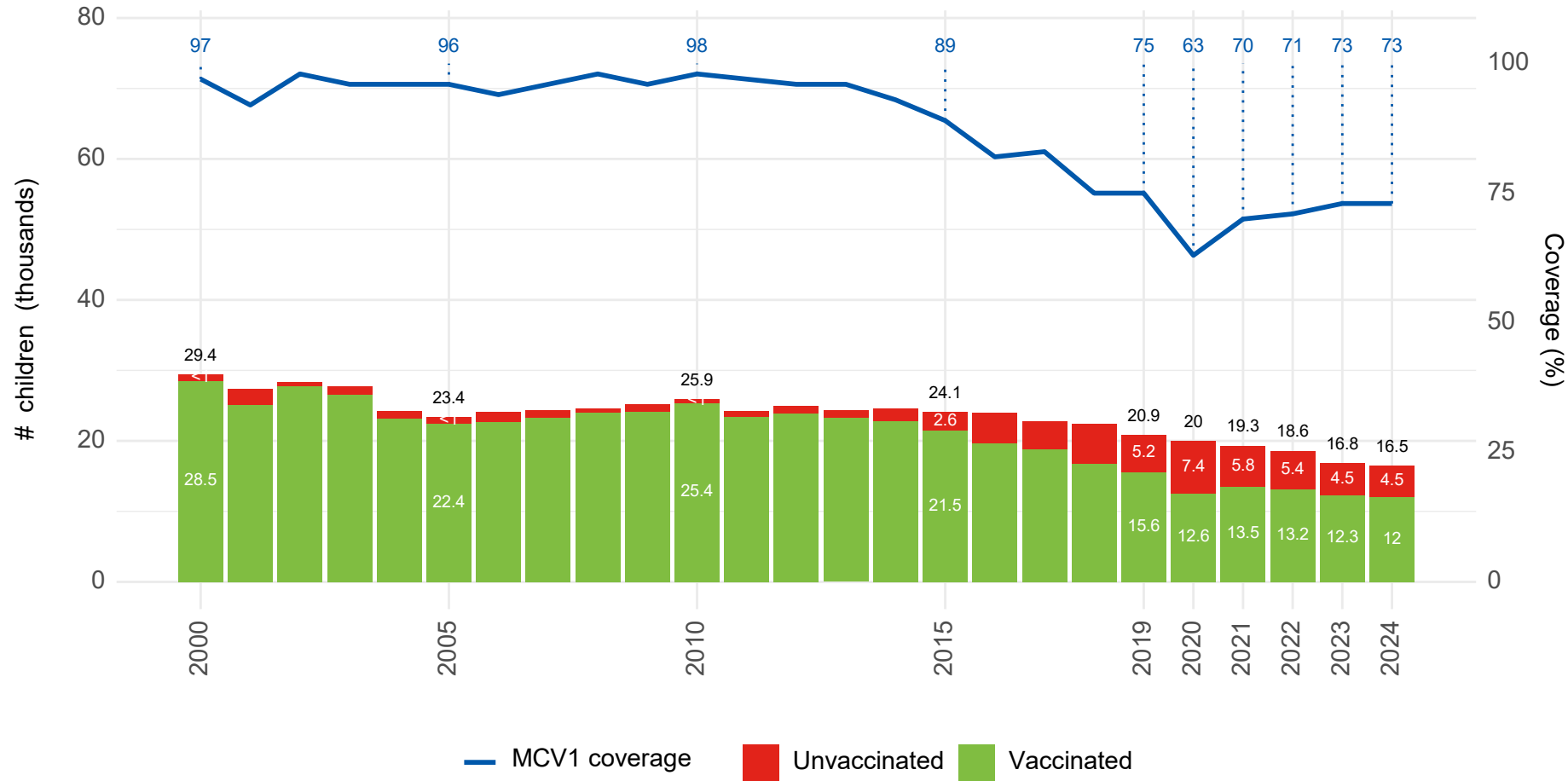
In 2024, North Macedonia ranked number 4 out of 21 countries for lowest MCV1 coverage (based on tied ranks).

North Macedonia was not in the top 10 countries with the most unvaccinated children.

Note: Large cohort countries may have high numbers of unvaccinated children despite high vaccine coverage. It is important to consider both coverage and absolute numbers of unvaccinated children to ensure vulnerable countries with small birth cohorts are not overlooked.

Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
Note: Bars are ranked by ascending coverage. Numbers in bubbles display top 10 rank based on absolute number of unvaccinated children.

Estimated MCV1 coverage, and number of vaccinated and unvaccinated children, North Macedonia, 2000-2024



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision

MCV1 coverage in 2024 (73%) was lower than in 2019 (75%).

The number of children vaccinated with MCV1 decreased 23% compared to in 2019.

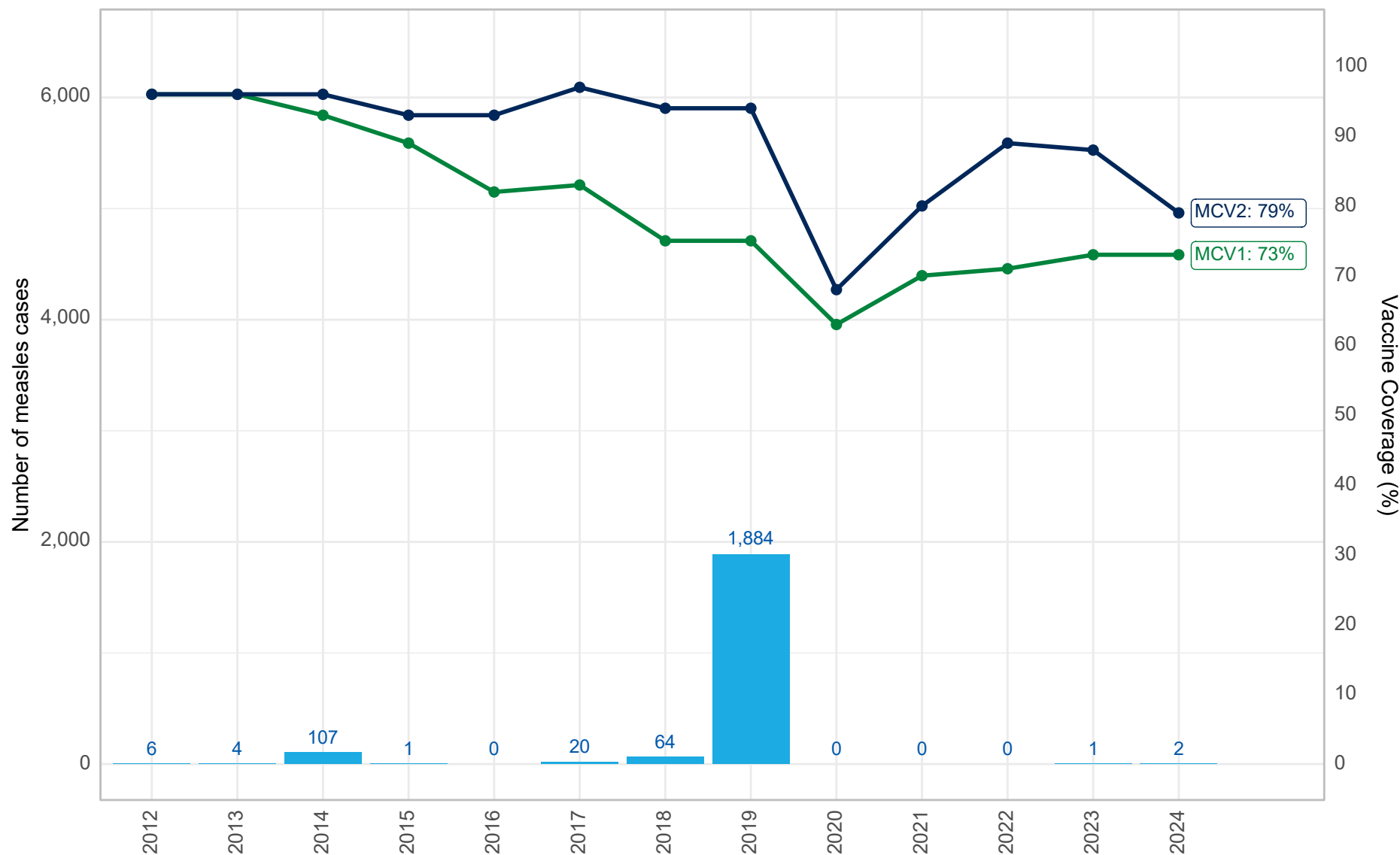
The number of surviving infants decreased approximately 21% compared to in 2019.

In 2024, fewer children were vaccinated than in 2019.

In 2024, there were fewer surviving infants (target population) than in 2019.

For vaccine coverage to increase, the number of children vaccinated needs to either increase or decline at a slower rate than the decline in surviving infant target population.

Trends in the number of measles cases and MCV coverage, North Macedonia, 2012-2024



In 2024, there was a total of 2 confirmed measles cases in North Macedonia. In the same year, MCV1 coverage was 73% and MCV2 coverage was 79%.

The number of cases in 2024 was 2 times more cases than in 2023 (n=1).

The highest number of measles cases was reported in 2019 (n=1,884). In this year, MCV1 coverage was 75%.

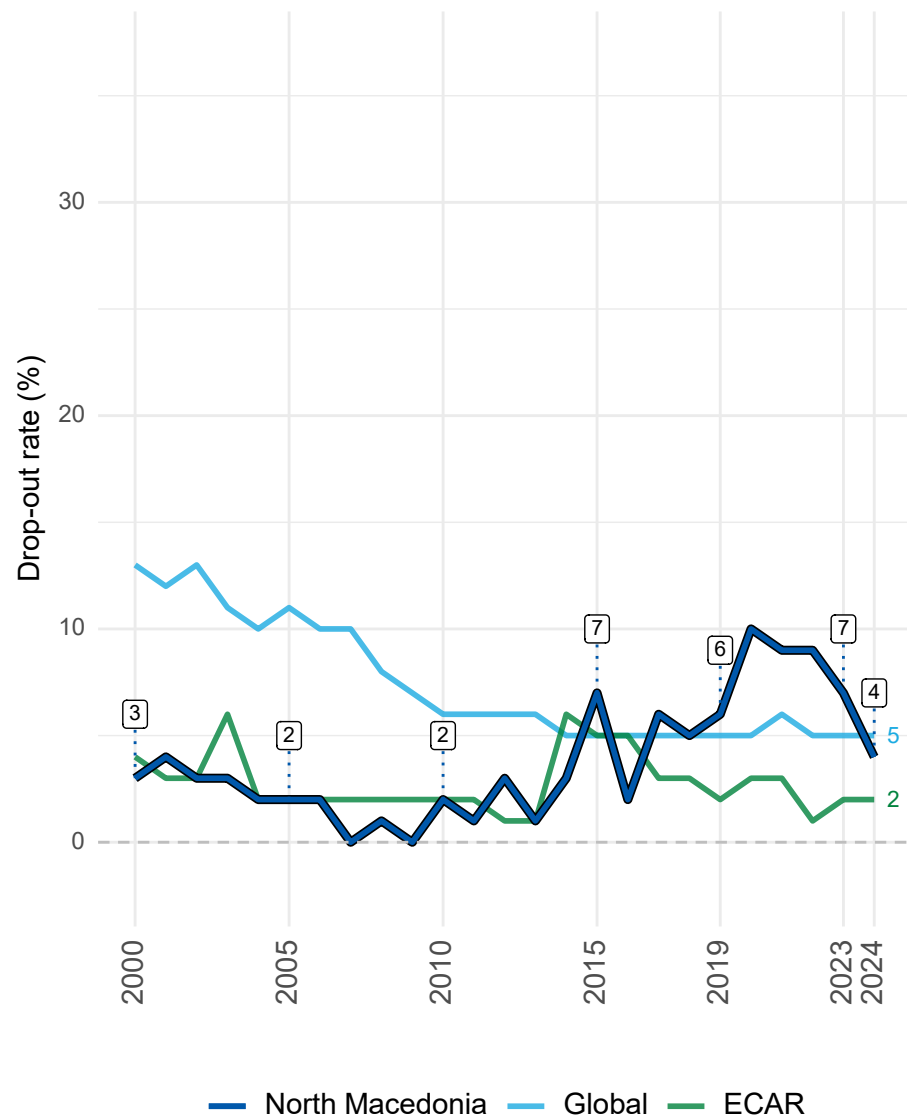
Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision;
Reported measles and rubella cases and incidence rates by WHO Member States, as of 08-Jul-25.
Provisional data based on monthly data reported to WHO (Geneva) as of July 2025.

Note: Asterisks (*) indicate years with measles vaccine stockouts and carets (^) indicates years with measles vaccination campaigns (national or subnational).

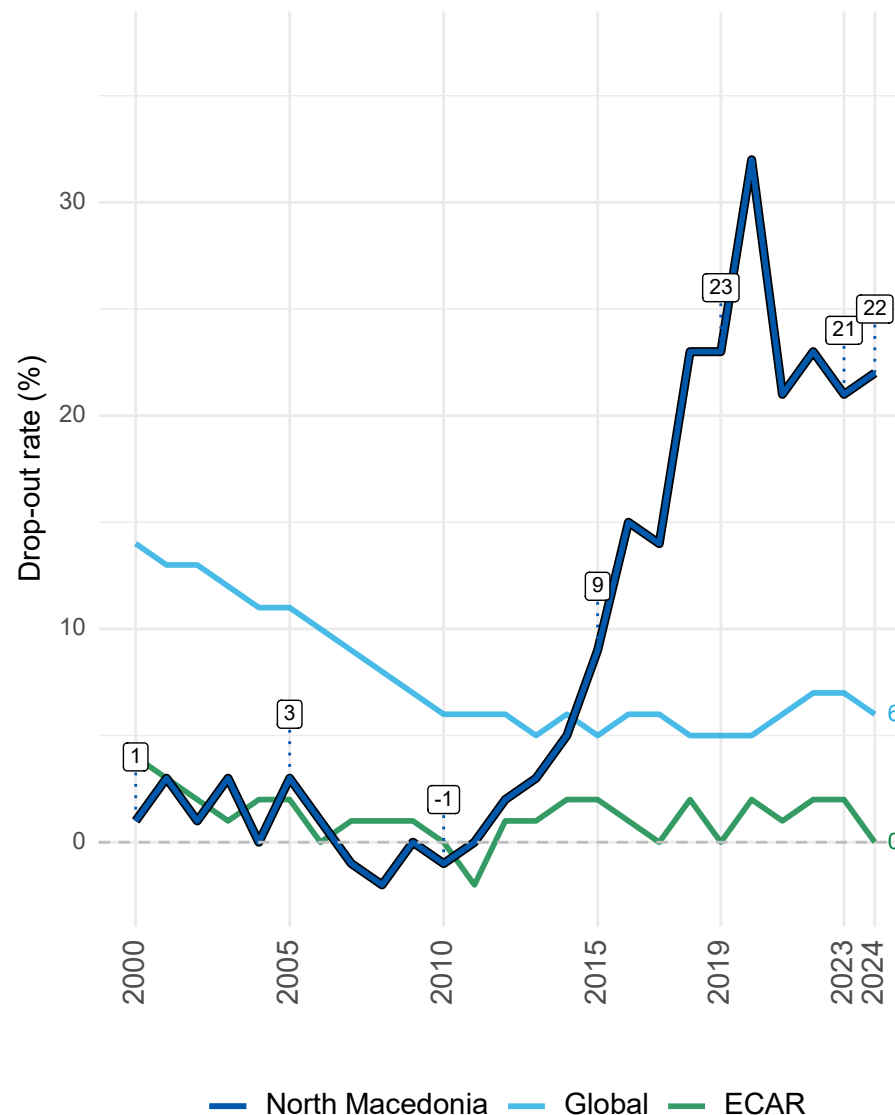
Childhood immunization: Additional charts

Zero-dose children are those who did not receive DTP1.

DTP1 and DTP3



DTP1 and MCV1



Drop-out rates show the percentage of children who received DTP1, but not DTP3/MCV1. Low drop-out rates indicate high retention of children in immunization programmes.

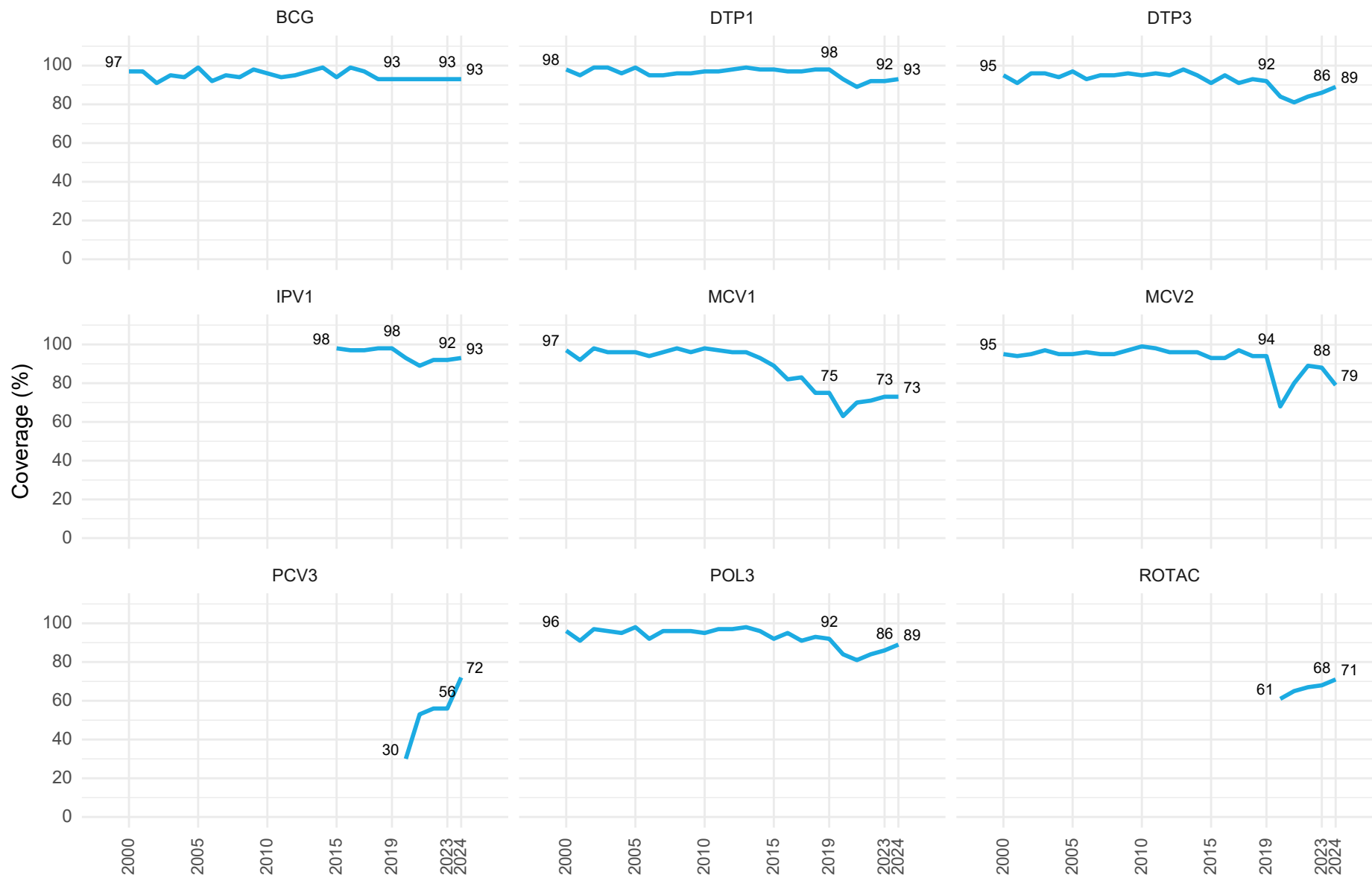
This chart shows trends in drop-out rates between DTP1 and DTP3, and DTP1 and MCV1.

In 2024, 4% of children who received DTP1 did not receive DTP3 (left), and 22% of children who received DTP1 did not receive MCV1 (right).

The low DTP drop-out rates imply good ability to provide a complete series of vaccines early in life. The high DTP-MCV drop-out rates imply poor retention in immunization programmes and ability to provide a full course of vaccines in infancy (up to one year).

In 2024, North Macedonia DTP drop-out was lower and DTP-MCV drop-out was lower than global drop-out rates, respectively.

Coverage of recommended childhood vaccines, North Macedonia, 2000-2024



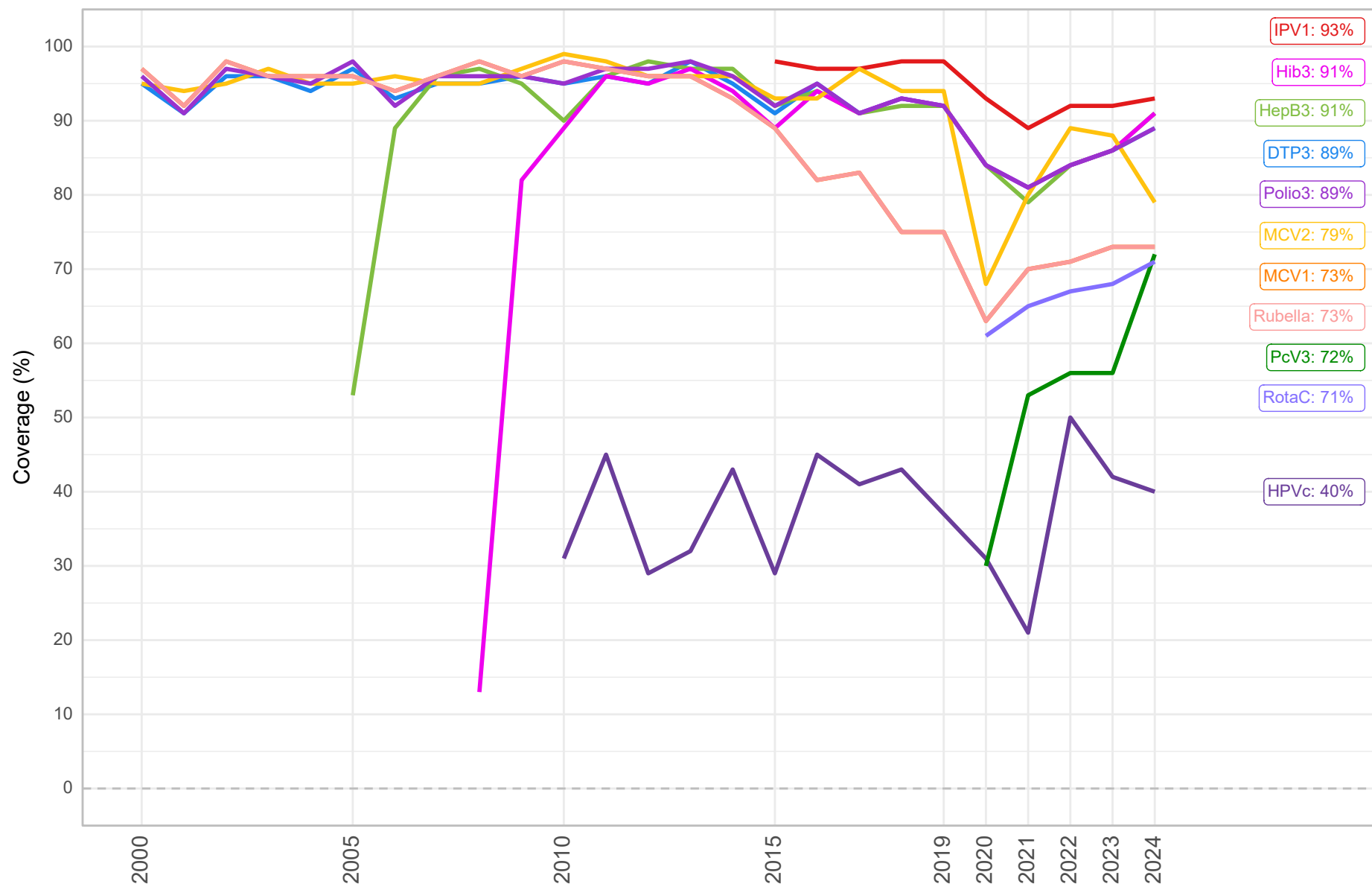
This chart shows trends in coverage of selected core routine vaccines recommended in childhood.

In 2024, ROTAC had the lowest coverage (71%), followed by PCV3 (72%).

Compared to 2019, coverage of one vaccine remained constant (BCG) and 6 vaccines decreased (DTP1, DTP3, IPV1, MCV1, MCV2 and POL3).

Compared to 2023, coverage of 2 vaccines remained constant (BCG and MCV1), 6 vaccines increased (DTP1, DTP3, IPV1, PCV3, POL3 and ROTAC), and one vaccine decreased (MCV2).

Vaccine coverage (%), North Macedonia, 2000-2024



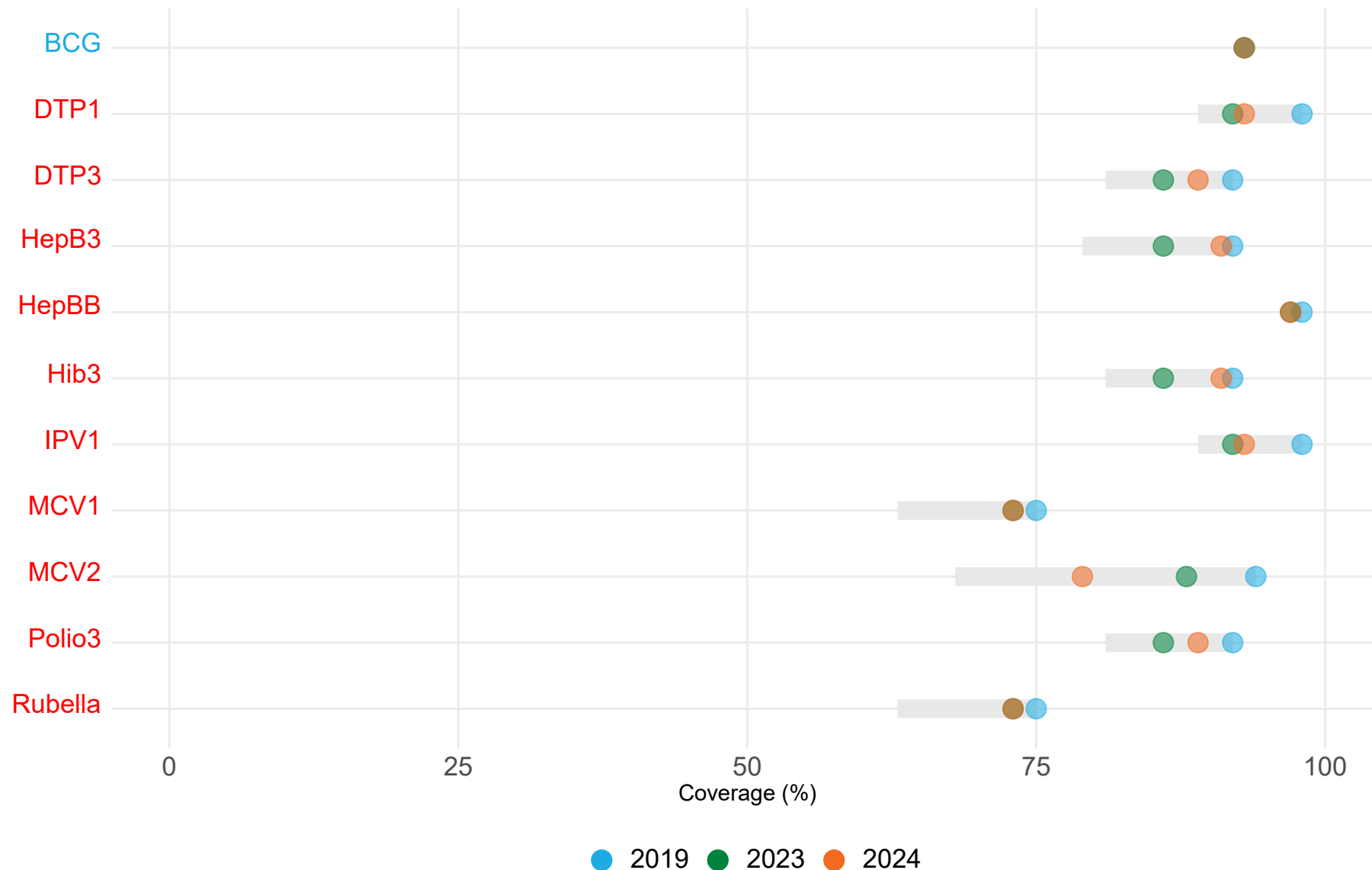
This chart shows trends in coverage of 9 vaccines (complete series).

In 2024, ROTAC had the lowest coverage of all vaccines (71%), followed by PCV3 (72%).

Coverage of 8 vaccines decreased (DTP3, HepB3, Hib3, IPV1, MCV1, MCV2, Polio3 and Rubella) and 1 vaccine increased (HPVc) compared to respective coverage in 2019.

Coverage of 7 vaccines increased (DTP3, HepB3, Hib3, IPV1, PcV3, Polio3 and RotaC), 2 vaccines decreased (HPVc and MCV2), and 2 vaccines were the same (MCV1 and Rubella) compared to respective coverage in 2023.

Vaccine coverage (%), North Macedonia, 2019-2024



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
 Note: The grey bar spans vaccine coverage across all years 2019-2024 and the dots represent coverage in specific years.
 Coverage is shown for vaccines with data all years 2019-2024.
 Vaccine names are coloured based on if coverage is lower (red), the same as (blue) or higher (green) than in 2019

This chart shows the range of coverage across all years 2019 to 2024 (grey bars), and coverage in specific years (dots), by vaccine. The chart can be used for assessing recovery to pre-pandemic levels.

DTP1 coverage declined between 2019 (98%) and 2023 (92%). DTP1 coverage increased in 2024 (93%) compared to 2023, and was lower than in 2019. In 2019-2024, DTP1 coverage was at it's lowest level in 2021 (89%).

In 2023, 10 vaccines had lower coverage than in 2019.

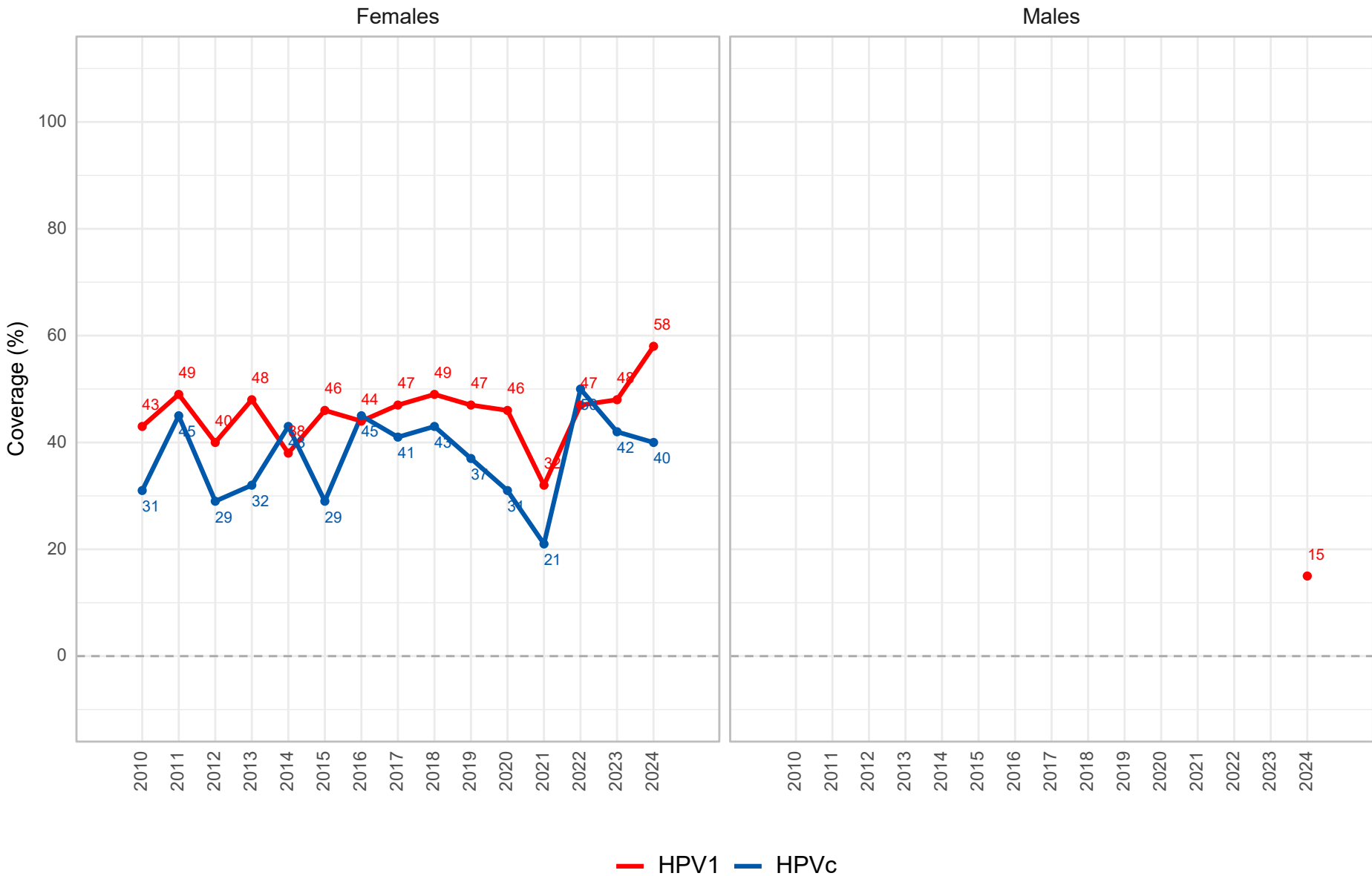
In 2024, 10 vaccines had lower coverage than in 2019.

In 2024, 1 vaccine had lower coverage than in 2023.

HPV vaccination

NA: • [Bruni et al. 2021, HPV vaccination introduction worldwide and WHO and UNICEF estimates of national HPV immunization coverage 2010–2019 \(supplementary materials\).](#)

Human papillomavirus (HPV) vaccine coverage (%), North Macedonia, 2010-2024



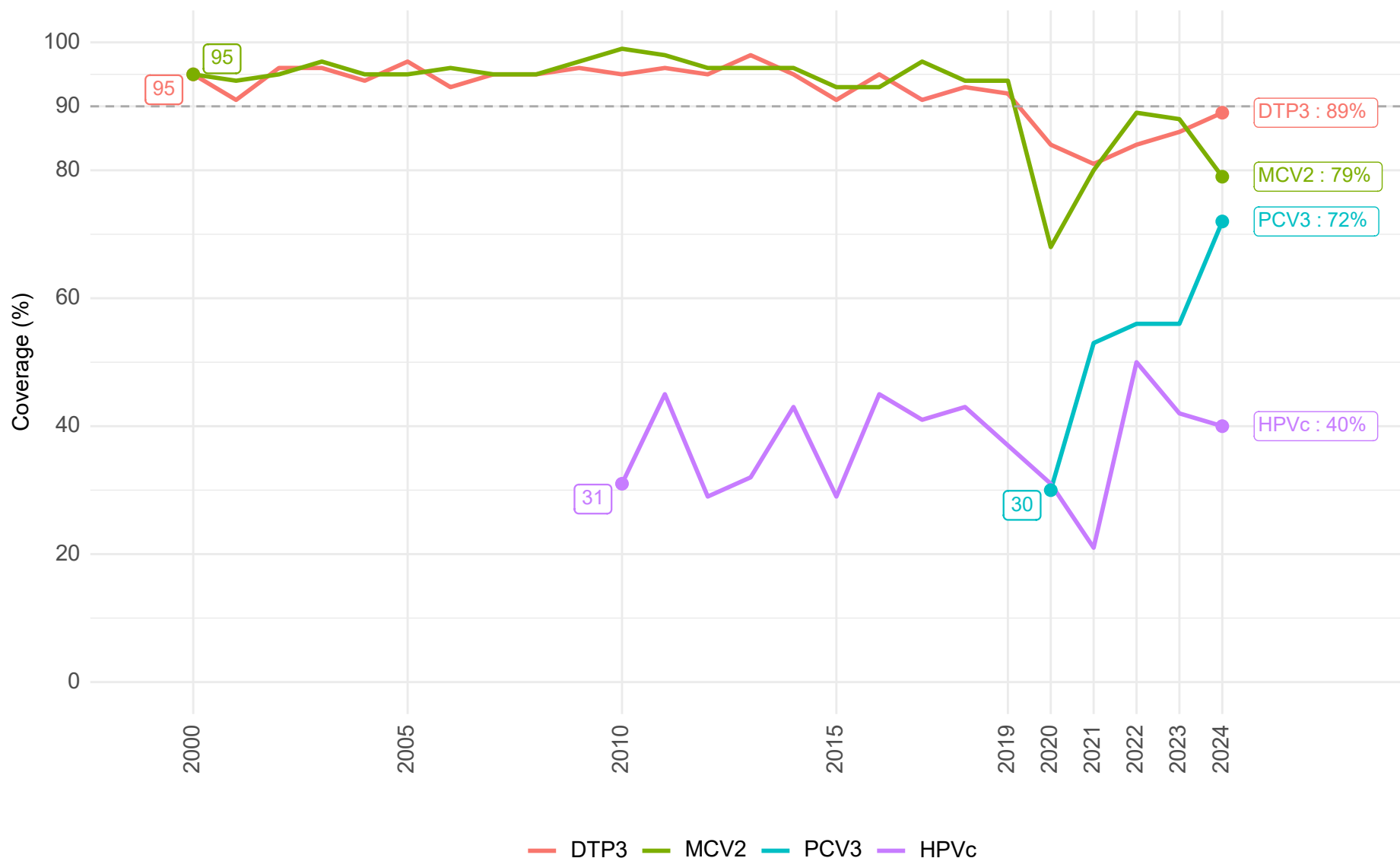
The first year of HPV programme coverage estimates in North Macedonia was 2010.

In 2024, first dose (HPV1) programme coverage among girls was 58% and last dose (HPVc) programme coverage was 40%.

Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision.
For some countries, if HPV vaccine is in the schedule, but the country did not report data in a given year, HPV programme coverage estimates are not produced.

SDG 3.b.1

SDG 3.b.1: Proportion of the target population covered by all vaccines included in their national programme, North Macedonia, 2000-2024



Source: WHO/UNICEF Estimates of National Immunization Coverage, 2024 revision
 Note: The four vaccination coverage indicators contribute to SDG indicator 3.b.1 are: DTP3, MCV2, PCV3 and HPVc
 The Immunization Agenda 2030 (IA2030) global target is 90% coverage of all four antigens by 2030.

Four vaccination coverage indicators contribute to Sustainable Development Goal 3, indicator b.1: DTP3, PCV3, MCV2 and HPV.

The IA2030 global target is 90% coverage of all four antigens by 2030.

North Macedonia has all 4 of the SDG vaccines.

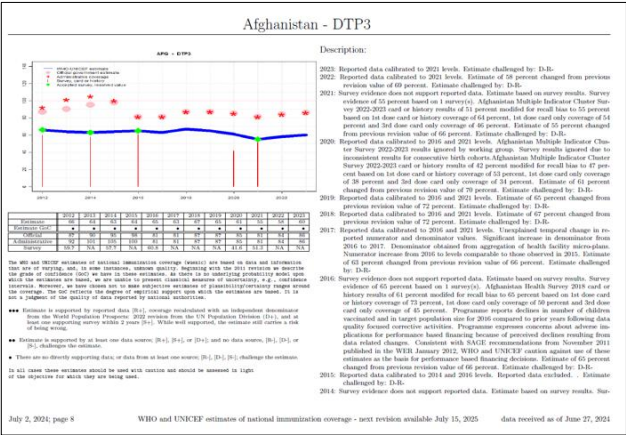
In 2024, North Macedonia had achieved at least 90% coverage of none out of the 4 vaccines.



WUENIC 2024 revision

Additional resources

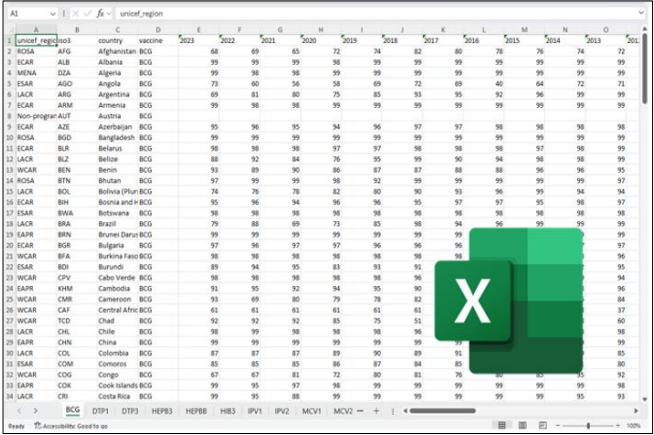
WUENIC country profiles



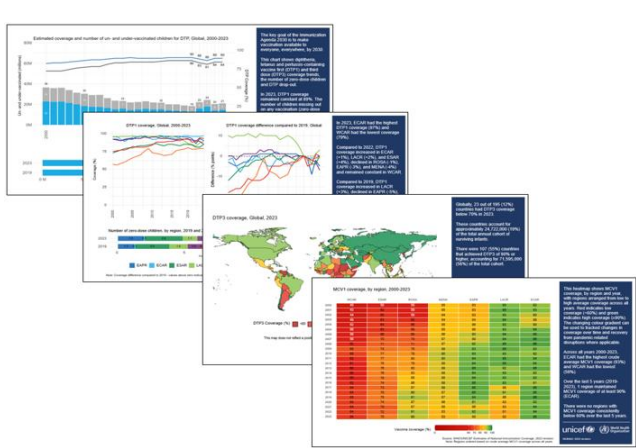
Interactive WUENIC country profiles



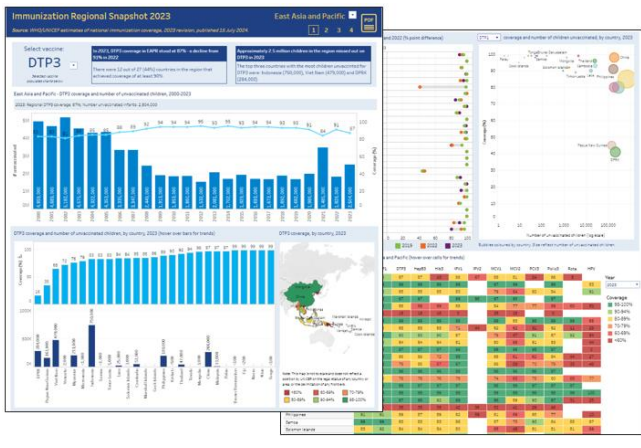
Datasets:
WUENIC, HPV, survey database



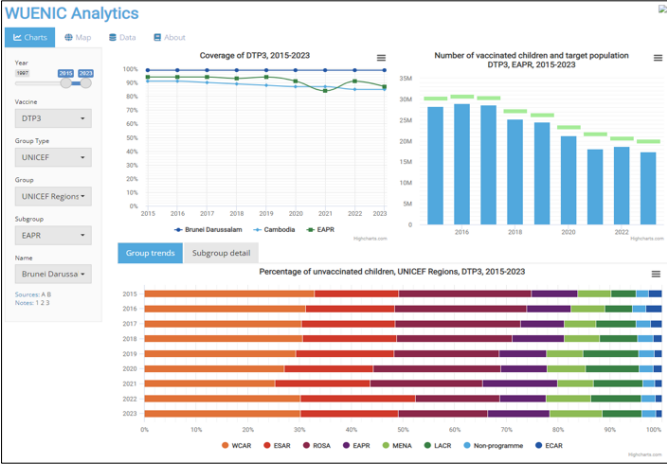
Country and region-specific
slide decks:
UNICEF, WHO, World Bank, Gavi and
African Union regions



Interactive immunization regional
snapshots:
UNICEF, WHO, World Bank, Gavi and
African Union regions



WUENIC Analytics Dashboard



Additional
resources

Short feedback questionnaire

(5 minutes)

We are seeking your feedback on the global groupings (GAVI, African Union, World Bank Income, WHO and UNICEF) and country-level PowerPoint slides developed for the release of global immunization estimates. Your input will help us understand their usefulness and identify areas for improvement.

Please take a few moments to complete this short survey and have your voice heard:



<https://forms.office.com/e/Qv1HXxxNZQ>

