Introduction to the National Resident Matching Program
Senate Finance Committee – Bipartisan Staff Discussion

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ABOUT THE NRMP. The National Resident Matching Program (NRMP) also referred to as The Match, is an independent, non-profit organization that places the nation’s medical school talent into clinical training programs, ensuring a steady pipeline of qualified professionals are building the skills to care for patients across the country.

With its proprietary algorithm, itself the subject and study of Nobel-Prize-winning research, the NRMP has built one of the most stable matching markets in the world with a focus on providing unparalleled services and data to the community.

Mission
To match healthcare professionals to graduate medical education and advanced training programs through a process that is fair, equitable, efficient, transparent, and reliable. To provide meaningful and accessible match data and analysis to stakeholders.
The NRMP is part of a larger ecosystem that helps support medical students as they matriculate into their clinical training. Each organization listed here serves some point along the continuum and each is led by their own missions and policies.

Transition to Residency Ecosystem

To extend its knowledge and expertise to other industries, the NRMP has established two subsidiaries, the most recent being the National Matching Program to support government agencies, including a two-year pilot for the Department of State Foreign Services Match.

National Resident Matching Program®
The Match®

In addition to running the largest physician matching market in the world, NRMP provides matching services through two subsidiaries:

National Resident Matching Program International®
(physician matching services outside U.S. and Canada)

National Matching Program℠
(matching services for U.S. government, higher education, and non-profit organizations)
The NRMP’s proprietary mathematical algorithm is the foundation of its matching program.

NRMP Matching Algorithm

The algorithm:
• is a functional algorithm; and
• is applicant proposing
• Considers the preferences of the applicant’s training choice and the training program’s choice of who they wish to train

The process begins by attempting to match an applicant to the program ranked #1 by that applicant

A tentative Match occurs if the program also ranked the applicant:
• and the program has unfilled positions OR
• the program is filled but the applicant is ranked higher than another applicant already matched tentatively to the program.

There is NO match if:
• The applicant and program did not rank each other or
• The program and applicant ranked each other, but the program filled with other applicants more preferred by the program

Matches are FINAL when:
• The algorithm completes its cycle through all applicant rank order lists and tentative matches are confirmed

Couples fully match when:
• The algorithm can place both partners in their highest ranked pair of programs on the primary list
• However, one partner can match even if the other does not

In addition to processing the matching program that supports the Main Residency Match and the more than 2 dozen fellowship matches, the NRMP is actively engaged the developing comprehensive data reports, vital research and analyses on the current state of the transition and ways to improve process and outcomes, and maintaining strong match policies to ensure equity, transparency, and professionalism. These QR codes provide access to the NRMP’s data and policy pages on our public website where you can access survey reports and results and data books, link to our interactive applicant demographic data charts, and review our Match Agreements and Codes of Conduct.
MAIN RESIDENCY MATCH DATA. The 2024 Main Residency Match included 44,853 applicants who certified a rank order list (“active applicants”) and 41,503 certified positions in 6,395 residency training programs.
**Record High Applicant Participation.** A total of 50,413 applicants registered in the 2024 Main Residency Match, an all-time high and increase of 2,257 or 4.7 percent over last year. The rise in applicants was driven largely by an increase of 1,986 non-U.S. citizen international medical graduates (IMGs) and 623 osteopathic (DO) seniors over last year.

Among all registrants, 44,853 certified a rank order list of training preferences, the highest number on record and an increase of 1,901 or 4.4 percent over last year. Of the applicants who certified a rank order list, 35,984 matched to a post-graduate year 1 (PGY-1) position, an increase of 1,162 applicants from last year. The PGY-1 match rate was 80.2 percent.

U.S. MD seniors remain the largest applicant group participating in the Match, and in 2024 numbered 20,296. This represents a decrease of 21 applicants compared to the 2023 Match; however, the number of U.S. MD seniors certifying a rank order list increased slightly to 19,755, seven more than last year.

** Applicant Match Rates Remain Steady.** Match rates remained steady among each of the four main applicant types with less than a one percentage point difference compared to the 2023 Main Residency Match.

- U.S. DO seniors achieved a 92.3 percent match rate, an all-time high and an increase of 0.7 percentage points over last year. Since 2019, the DO senior match rate has increased 4.2 percentage points.
- U.S. MD seniors realized a 93.5 percent match rate, a decrease of 0.2 percentage points from last year. The U.S. MD senior match rate remains within the historic 92 – 95 percent range that has been steady since 1982.
- U.S. citizen IMGs realized a 67.0 percent match rate, a decrease of 0.6 percentage points from last year.
- Non-U.S. citizen IMGs realized a 58.5 percent match rate, a decrease of 0.9 percentage points since last year.

**PGY-1 Match Rate by Applicant Type**

Main Residency Match Rate

![Graph showing match rates by applicant type from 2015 to 2024](image-url)
Increased Program and Position Participation. The 2024 Main Residency Match included 6,395 certified programs offering 41,503 PGY-1 and PGY-2 training positions, the largest number in the NRMP’s 72-year history. Increases afforded applicants access to 125 more programs and 1,128 positions which is 2.8 percent more than the 2023 Main Residency Match.

- Of all positions offered, 38,941 filled for a rate of 93.8 percent, a 0.5 percentage point increase over last year.
- Of the 6,395 total certified programs, 5,608 filled at a rate of 87.7 percent, an increase of 1.1 percentage points over last year.

Fluctuation in Primary Care. Concerns remain about a shortage of primary care physicians across the U.S., and NRMP data offer insights into trends.

The 2024 Match offered 19,423 primary care positions, the largest number on record and 46.8 percent of all the positions offered in the Match. Primary care specialties are defined as categorical PGY-1 positions that provide the full training required for board certification in Family Medicine, Internal Medicine, Internal Medicine-Pediatrics, and Pediatrics. There were 719 more primary care positions offered in 2024, and the fill rate for the specialties combined was 92.9 percent.

While strong, the primary care fill rate fell slightly in 2024 by 1.4 percentage points, largely due to changes in Pediatrics.

In the 2024 Match, Pediatrics offered 3,139 categorical and primary positions, an increase of 93 over 2023, and filled 2,887 resulting in a fill rate of 92 percent compared to 97.1 percent in 2023. After the algorithm was processed, 252 Pediatrics positions were unfilled, an increase of 164 over last year. Notably, the percentage of U.S. MD seniors that matched to Pediatrics categorical positions in 2024 was 47.6 percent, a decrease of 7.2 percentage points from last year.
Rebound in Emergency Medicine. After a two-year decline, Match data reflect a resurgence in Emergency Medicine fill rates. Emergency Medicine achieved its historically high fill rate of 98 – 99 percent in the 2017 – 2021 Matches. By 2023, the fill rate had dropped by 17.9 percentage points, driven in part by the strain the specialty experienced during the height of the COVID-19 pandemic. In 2024, Emergency Medicine offered 3,026 positions, an increase of 16 positions from 2023 and filled 2,891 to earn a 95.5 percent fill rate, an increase of 13.9 percentage points. There were 135 positions unfilled after the matching algorithm was processed compared to 554 unfilled positions in 2023.

Continued Strength in Obstetrics and Gynecology. The specialty had another very strong Match, even with the two-year anniversary of the Dobbs v. Jackson Women’s Health Organization Supreme Court decision approaching this summer. Only six categorical positions remained unfilled after the matching algorithm was processed. OB/GYN achieved a 99.6 percent fill rate in the 2024 Match, continuing a strong trend of filling over 99 percent of positions offered every year for the past five years and filling at least 90 percent of positions with U.S. MD and DO seniors.

POPULATION PROFILES AND TRENDS. NRMP data can also be studied by US census code. The data shown here are from the 2023 Main Match. The most GME positions in the Match come from the Mid-Atlantic and E. North Central Regions. The fewest available positions are in the Mountain and E. South Central Regions.
NRMP is also able to track program density through US heat maps. As an example, when examining available internal medicine programs care across the US, we see there that most but not all (Wyoming) states offer internal medicine training programs.

A larger swath of the country is without training programs in Emergency Med, including Idaho, Wyoming, Montana, North Dakota, and South Dakota.
More recently, the NRMP has begun examining some of its data by zip code to gain a better understanding of migration in and out of rural areas for undergraduate medical education and residency training. Data in the last two tables is based on the definition of rural using Rural-Urban Commuting Area Codes (RUCA) although outcomes are not dissimilar from when the data were produced using definitions proffered by HRSA or the Federal Office of Rural Health Policy Funding Programs (usually <0.10 percentage points of RUCA estimates).

The Table below shows the rurality distribution of four medical school migration to residency program training groupings by applicant type. Slightly higher percentages of non-rural education to rural training migration were observed among all applicant types save U.S. MD Seniors. Specifically, the highest migration of non-rural education setting to rural training setting was among U.S. DO Graduates (4.21%). In line with these findings, the highest migration of non-rural to non-rural was among U.S. MD Seniors (96.22%). Finally, U.S. DO Seniors were most likely to leave rural settings for their education to pursue training positions in non-rural settings (6.01%).

### Rural Training: by Applicant Type

<table>
<thead>
<tr>
<th>Applicant Rurality to Residency Program Rurality, 2019-2023</th>
<th>Applicant Type</th>
<th>U.S. MD Seniors N (%)</th>
<th>U.S. DO Seniors N (%)</th>
<th>U.S. MD Graduates N (%)</th>
<th>U.S. DO Graduates N (%)</th>
<th>U.S. IMGs N (%)</th>
<th>Non-U.S. IMGs N (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rural to Rural</td>
<td></td>
<td>178 (0.17)</td>
<td>177 (0.51)</td>
<td>25 (0.45)</td>
<td>13 (0.61)</td>
<td>42 (0.25)</td>
<td>42 (0.29)</td>
</tr>
<tr>
<td>Rural to Non-Rural</td>
<td></td>
<td>2765 (2.66)</td>
<td>2,084 (6.01)</td>
<td>143 (2.57)</td>
<td>89 (4.21)</td>
<td>435 (2.55)</td>
<td>203 (1.40)</td>
</tr>
<tr>
<td>Non-Rural to Rural</td>
<td></td>
<td>986 (0.95)</td>
<td>819 (2.36)</td>
<td>122 (2.19)</td>
<td>89 (4.21)</td>
<td>459 (2.69)</td>
<td>284 (1.96)</td>
</tr>
<tr>
<td>Non-Rural to Non-Rural</td>
<td></td>
<td>100,113 (96.22)</td>
<td>31,573 (91.11)</td>
<td>5,273 (94.79)</td>
<td>1,924 (90.97)</td>
<td>16,131 (94.52)</td>
<td>13,960 (96.35)</td>
</tr>
<tr>
<td>TOTAL</td>
<td></td>
<td>104,042</td>
<td>34,653</td>
<td>5,563</td>
<td>2,115</td>
<td>17,067</td>
<td>14,489</td>
</tr>
</tbody>
</table>

The last table shows the position-level distribution of the four applicant rurality to residency program rurality groupings for select specialties. Noteworthy findings include that 4.09% of Family Medicine positions were characterized as applicants from non-rural obtaining positions at rural programs, compared to 0.67-1.53 among other specialties included in the table. However, 5.73% of Family Medicine positions were characterized as rural to non-rural, a slightly higher percentage than among other included specialties.
The NRMP is pleased to make its data available to all stakeholders interested in understanding clinical specialty distribution in the United States and trends and development of the current and future physician workforce. As an organization we are committed to

- **Informing efforts to improve the transition to residency and support a robust physician workforce;**

- **Generating unparalleled data resources and research to empower applicant choice of specialty; and**

- **Showcasing geographic distribution of physicians and specialties across the nation to better understand population health.**