

Improving Dental Sealant Literacy in Spanish and Chinese-Speaking Parents and Children



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INTRODUCTION

Dental sealants reduce caries risk by up to 80% (CDC), yet utilization at NYU Langone Family Health Center was suboptimal, particularly among Chinese- and Spanish-speaking populations due to language and dental literacy barriers. To address this, we implemented culturally and linguistically appropriate educational posters (Spanish and Chinese) in November 2023, improving caregiver understanding and acceptance of sealants. Additionally, separate appointments for sealant placement created barriers to care. Beginning January 2024, sealants were incorporated into new patient exams and recall visits, reducing missed opportunities and improving access to preventive treatment.

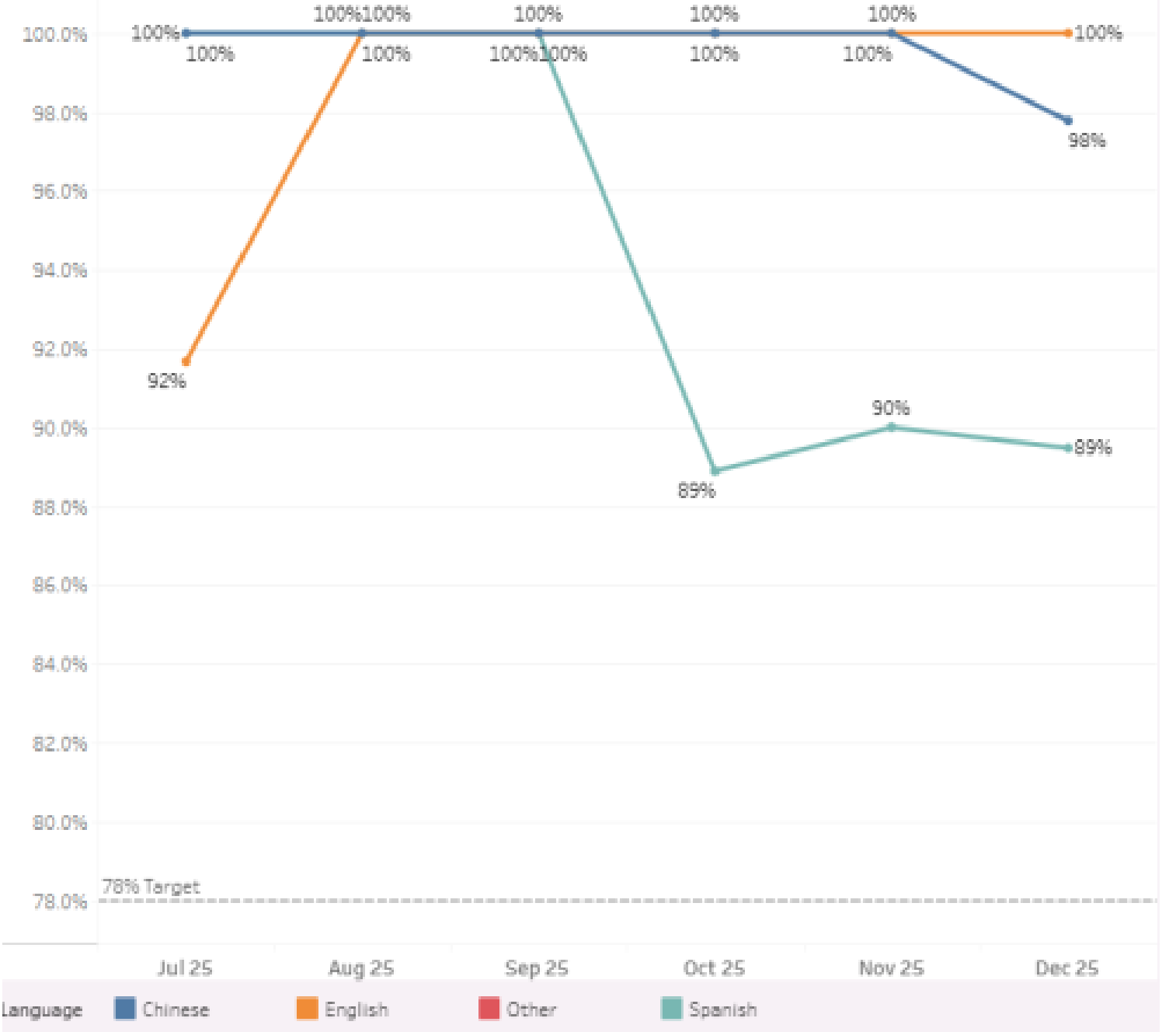
PURPOSE

This study aims to increase dental sealant literacy and acceptance among families at NYU Langone Brooklyn FHC, where a diverse patient population (Spanish-, Chinese-, and English-speaking) faces language barriers that may limit understanding and use of sealants as an effective caries prevention method. By implementing educational posters in patients' preferred languages, the project seeks to improve comprehension of sealant benefits and the application process, ultimately increasing long-term acceptance. Building on prior FHC efforts, this initiative also aims to reduce disparities in sealant utilization among pediatric patients (ages 6–9) and improve performance on the UDS dental sealant quality measure, with the goal of achieving the 80% benchmark across all language groups.

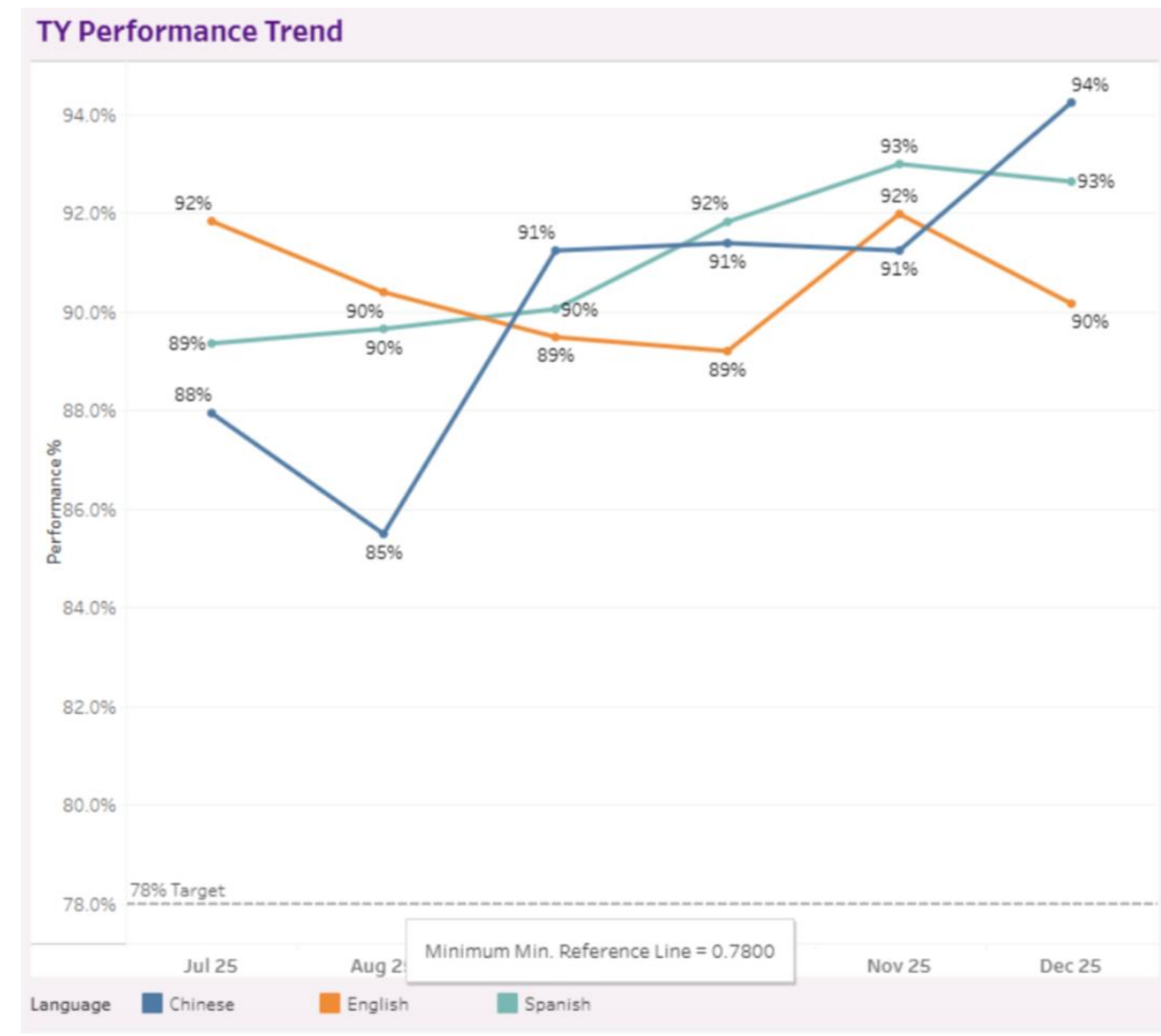
METHOD

Under the FHC Healthcare Equities Task Force, NYU Langone Brooklyn Sunset Park and Seventh Avenue sites implemented sealant educational posters for families in Spanish and Chinese starting November 1st of 2023. Sealants were required to be placed for 6-9 year old patients at all new patient and recall visits beginning January 2024. Smartphrases were implemented into new patient exam and recall visits to assess patient acceptance of sealants, provider adherence to sealant protocol, and document barriers to sealant placement. Data regarding sealant placement was collected from July 2025 through December 2025.

FIGURE 1. Sealant data July 2025-December 2025 Seventh Avenue (above) and Sunset Park (below) Sites



Month of Measurement	Period End Date	Denominator	Numerator	Performance %
July 2025	July 2025	67	66	98.5%
August 2025	August 2025	72	72	100.0%
September 2025	September 2025	79	79	100.0%
October 2025	October 2025	84	82	97.6%
November 2025	November 2025	79	77	97.5%
December 2025	December 2025	77	74	96.1%



Month of Measurement	Period End Date	Denominator	Numerator	Performance %
July 2025	July 2025	461	415	90.0%
August 2025	August 2025	469	419	89.3%
September 2025	September 2025	450	405	90.0%
October 2025	October 2025	438	398	90.9%
November 2025	November 2025	422	390	92.4%
December 2025	December 2025	401	369	92.0%

RESULTS

Data from this project shows a notable increase in sealant acceptance and completion among Spanish- and Chinese-speaking populations at the 7th Avenue and Sunset Park FHC clinics. Overall performance improved, with the sealant benchmark rising from 78% in 2024 to 80% in 2025, reflecting steady progress (Chu, Liu, et al., 2024). Prior data also demonstrated increases in sealant rates among Spanish-speaking patients from 84% (April 2024) to 86% (March 2025), and among Chinese-speaking patients from 75% to 80% over the same period. At the 7th Avenue FHC, monthly sealant completion rates from July through December remained consistently high across all language groups and exceeded the 78% institutional target. English-speaking patients improved from 92% in July to 100% in August and maintained 100% through December. Chinese-speaking patients also remained near 100% throughout, with a slight dip to 98% in December. Spanish-speaking patients showed greater variability, declining from 100% in September to 89% in October, followed by a partial recovery to 90% in November and 89% in December. At the Sunset Park FHC, completion rates for English-, Chinese-, and Spanish-speaking patients also remained above the 78% target throughout the study period. Chinese-speaking patients exhibited the most variability early on, with a decrease in August followed by steady improvement through December, while English- and Spanish-speaking groups demonstrated more stable trends with only minor fluctuations.

CONCLUSIONS

Sealant completion rates exceeded the institutional target across all language groups; however, disparities by primary language persisted at the Seventh Avenue FHC. English- and Chinese-speaking patients consistently maintained high completion rates, likely due to better understanding and acceptance of preventive care when education and clinic workflows were language-concordant. In contrast, Spanish-speaking patients showed lower and more variable completion rates beginning in October, indicating ongoing barriers related to language, health literacy, and access to care. These findings emphasize the need for culturally and linguistically appropriate education, as well as integrating sealant placement into same-day exams and recall visits to reduce missed preventive opportunities and improve equity in care. At Sunset Park FHC, completion rates also remained above target for all language groups, though trends differed. Chinese-speaking patients demonstrated early variability but improved steadily, achieving the highest completion rates by December. English- and Spanish-speaking patients showed more stable performance, with Spanish-speaking patients gradually improving over time. Overall, the more consistent outcomes across language groups at this site suggest fewer language-related barriers, though continued emphasis on language-concordant education is important to sustain equitable preventive care.

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