Spotlight

Annual Wellness Visits among Medicare Advantage Enrollees: Trends, Differences by Race and Ethnicity, and Association with Preventive Service Use

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The Medicare Annual Wellness Visit (AWV) is a preventive health benefit created by the Patient Protection and Affordable Care Act of 2010. As of January 2011, all Medicare beneficiaries may start receiving free AWVs 12 months after becoming eligible for Medicare. The purpose of the AWV, which is not considered a physical examination, is to develop or update a personalized prevention plan and to promote the use of evidence-based preventive services. As part of the AWV, a health care provider conducts a health risk assessment, offers certain screening tests, and takes a handful of biometric measurements (e.g., height, weight, blood pressure).

Prior research on the AWV has focused on traditional, or fee-for-service (FFS), Medicare and has shown that, in general, beneficiaries are unlikely to use this benefit.[1] According to the Center for Medicare & Medicaid Services (CMS), 17.7 percent of FFS Medicare beneficiaries had an AWV in 2015. CMS does not calculate AWV usage estimates specifically for Medicare Advantage (MA), Medicare's private plan alternative, and instead assumes that utilization rates among MA and FFS enrollees are identical.[2]

Enrollment in MA is growing and now covers about one in every three Medicare beneficiaries nationwide.[3] Because it is important to understand how health care utilization patterns may differ between FFS and MA enrollees, the AARP Public Policy Institute studied national patterns of AWV use among MA enrollees and explored the relationship between the AWV and preventive health services.

Key Findings

- **The share of Medicare Advantage enrollees who received an Annual Wellness Visit (AWV) quadrupled between 2011 and 2015, from 6.2 percent to 25.2 percent.**
- **Whites had the highest AWV rates, while Hispanics had the lowest.**
- **Older adults who had an AWV were more likely to receive certain preventive health services.**

Methods

We calculated annual rates of AWV utilization among adults ages 65 and older enrolled in MA plans offered by a single insurer from 2011 to 2015. In addition to examining overall rates, we calculated differences in AWV use according to enrollees' socio-demographic characteristics (race/ethnicity, gender, age, and Census region). Finally, we

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examined the relationship between the AWV and receiving certain preventive health services.

We used data from the OptumLabs® Data Warehouse, a database of de-identified claims for commercially insured and MA enrollees in a large US health plan.[4] We required MA enrollees to be continuously enrolled throughout the 12 months of each calendar year. Our analytic sample sizes ranged from 1.1 million in 2011 to 1.7 million in 2015.

We identified AWVs as Current Procedural Terminology (CPT) codes G0438 (first AWV) and G0439 (subsequent AWVs) on the insurance claim form. Services included in the AWV are outlined in the appendix. We also identified services provided on the same day as the AWV by examining all additional CPT and Healthcare Common Procedure Coding System (HCPCS) codes on the insurance claim. Among these same-day services, we identified evaluation and management (E&M) visits using CPT codes 99201–99215. E&M visits are "problem-oriented" medical visits that include a problem-focused patient history, a problem-focused examination, and/or some level of medical decision making. Codes for other same-day services and for preventive services are denoted in the accompanying table and figures.

To examine the relationship between the AWV and use of preventive health services, we analyzed data from 2015, our most recent year of data and the year with the most AWVs. First, we flagged enrollees who in 2015 received the following preventive services commonly used by older adults: pneumonia, influenza, and shingles vaccines; medication inventory; depression screening, electrocardiogram (ECG); lipid panel; and certain cancer screenings, including colorectal, breast, cervical, and prostate. We then compared rates of preventive services use among individuals who did and did not have an AWV in 2015 and calculated the relative risk (RR) of receiving the preventive services. For these analyses, we did not require that the preventive service be provided on the same day as the AWV, just that both the preventive service and AWV occurred during the 2015 calendar year. We used Chi-square tests to identify any differences in proportions between the two groups with a two-sided p-value of less than 0.05 representing statistical significance.

Results

Overall, 6.2 percent of Medicare Advantage enrollees in our sample had an AWV in 2011, the first year the benefit was offered. That share increased substantially over the following four years, reaching 9.5 percent in 2012, 13.7 percent in 2013, 17.8 percent in 2014, and 25.2 percent in 2015.

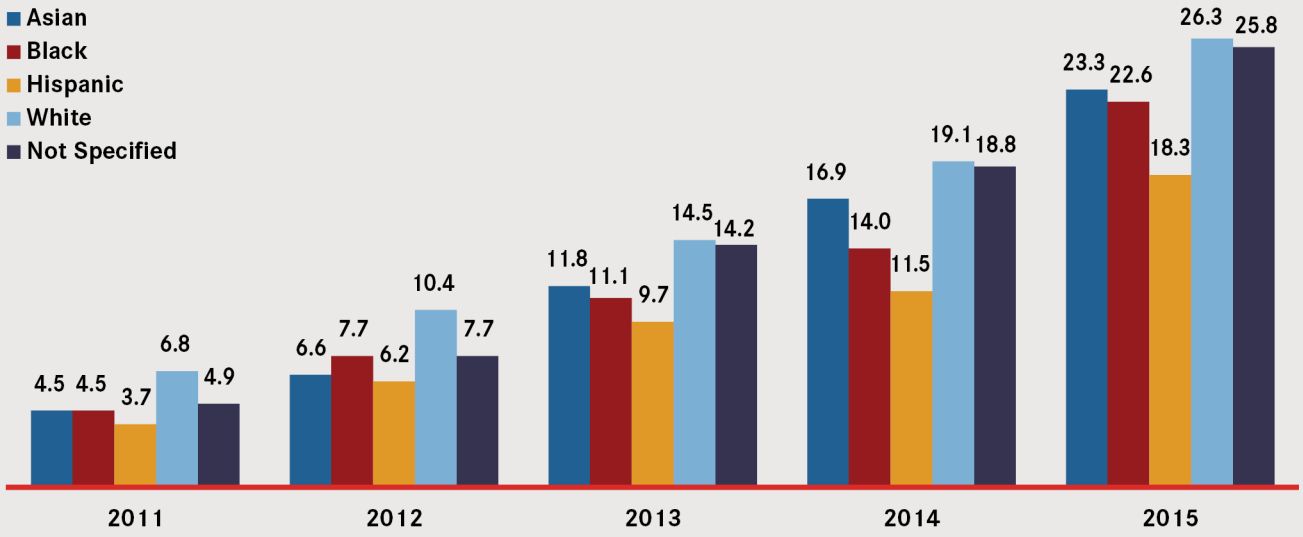
In each year from 2011 to 2015, AWV rates were highest among Whites and lowest among Hispanics (figure 1). For example, in 2015, 26.3 percent of White MA enrollees had an AWV, compared with only 18.3 percent of Hispanic enrollees. In 2015, AWV rates were also slightly higher among women (25.7 percent v. 24.5 percent for men), those living in the South Census region (27.1 percent, compared with 26.4 percent in the Midwest, 25.5 percent in the West, and 19.5 percent in the Northeast), and those ages 65–74 (26.1 percent v. 24.1 percent for those 75 years old and older; data not shown).

Our analysis of services received the same day as the AWV shows that, in 2015, an E&M visit was the most common service received on the same day as the AWV, with nearly half of our sample (45 percent) having such a visit on the same day as the AWV. The second, third, and fourth most common preventive services delivered on the same day as the AWV were lipid panel (30.2 percent), metabolic panel (26.3 percent), and pneumonia vaccine (23.5 percent), respectively (figure 2).

In 2015, those who had an AWV were more likely to receive several preventive services than those who did not have an AWV (table 1). The most substantial difference was in screening for depression. Those who had an AWV in 2015 were nearly 5 times more likely to be screened for depression compared to those who did not have an AWV (AWV = 7.1 percent, no AWV = 1.6 percent; RR = 4.6; $p < 0.05$). The second largest difference in proportions in service provision between those with and without an AWV was medication inventory: AWV = 5.8 percent, no AWV = 2.4 percent (RR = 2.4; $p < 0.05$). Finally, the pneumonia vaccine was

FIGURE 1

Rates of Annual Wellness Visits by Race/Ethnicity among MA Enrollees, 2011–2015 *(percentage)*

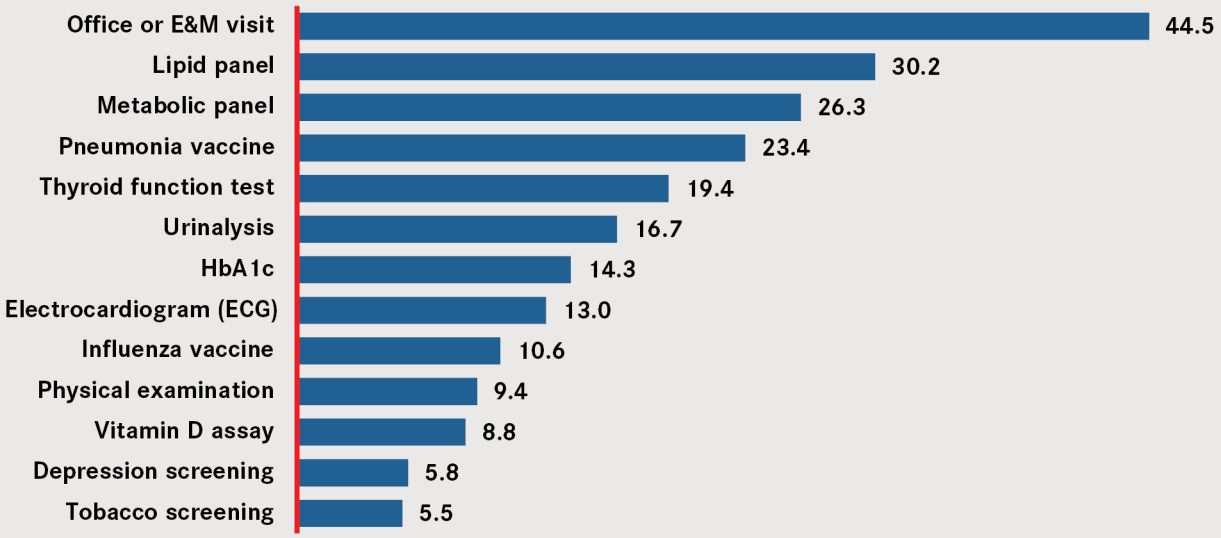


Source: OptumLabs Data Warehouse.

AWV CPT codes: G0438 and G0439.

FIGURE 2

Most Common Services Received during Annual Wellness Visits among MA Enrollees, 2015 *(percentage)*



Source: OptumLabs Data Warehouse.

CPT/HCPCS codes: Office E&M visit = 99201–99205 and 99211–99215; Lipid panel = 80061; Metabolic panel = 80053; Pneumonia vaccine = G0009; Thyroid function test = 84443; Urinalysis = 81001–81003; HbA1c = 83036; ECG = 93000; Influenza vaccine = G0008; Physical examination = 99386, 99387, 99396, and 99397; Vitamin D assay = 82306; Depression screening = G0444; Tobacco screening = 1036F.

TABLE 1

Preventive Service Utilization in MA Enrollees with and without an AWV, 2015, *N* = 1,762,413

Preventive Service	AWV *N* = 443,674	No AWV *N* = 1,318,739	Relative Risk (95% CI)	*p*-Value
Pneumonia vaccine	38.6%	19.2%	2.01 (2.00, 2.02)	<0.05
Influenza vaccine	44.4%	33.0%	1.35 (1.34, 1.35)	<0.05
Shingles vaccine	0.8%	0.6%	1.31 (1.25, 1.36)	<0.05
Medication inventory	5.8%	2.4%	2.39 (2.35, 2.43)	<0.05
Depression screening	7.1%	1.6%	4.59 (4.51, 4.66)	<0.05
Electrocardiogram (ECG)	42.2%	35.6%	1.19 (1.18, 1.19)	<0.05
Lipid panel	84.6%	61.6%	1.37 (1.37, 1.38)	<0.05
Colorectal cancer screening	19.1%	11.4%	1.68 (1.67, 1.69)	<0.05
WOMEN ONLY	***N* = 263,996**	***N* = 763,439**		
Mammogram	54.7%	35.0%	1.56 (1.52, 1.59)	<0.05
Pap test	8.3%	5.7%	1.45 (1.39, 1.51)	<0.05
MEN ONLY	***N* = 179,678**	***N* = 555,300**		
Prostate-specific antigen (PSA) test	61.7%	39.5%	1.56 (1.51, 1.61)	<0.05

Source: OptumLabs Data Warehouse.

AWV = annual wellness visit, CI = confidence interval

CPT/HCPCS codes: Pneumonia vaccine = G0009; Influenza vaccine = G0008; Shingles vaccine = 90736; Medication inventory = 1159F–1160F; Depression screening = G0444; ECG = 93000; Lipid panel = 80061; Colorectal cancer screening = 45330–45347 and 45378–45392; Mammogram = 77052, 77055–77057, and G0202; Pap test = 88141–88143, 88147, 88148, 88150, 88152, 88153, 88164–88167, 88174, 88175, G0123, G0124, G0141, G0143–G0145, G0147, G0148, and P3000; PSA = 84152–84154 and G0103.

more likely to be administered to those who had an AWV (38.6 percent) compared with those who did not (19.2 percent) (RR = 2.0, $p < 0.05$).

Discussion

The share of MA enrollees who received an AWV quadrupled from 6.2 percent in 2011 to 25.2 percent in 2015. Our 2015 estimate is 42 percent higher than the CMS estimate for the FFS population and is consistent with previous research findings of higher rates of preventive visits in MA than FFS.[5] The cause of the AWV usage increase among the MA population between 2011 and 2015 is unknown. In FFS Medicare, research suggests that physicians and health systems, rather than patients, are driving the increase in AWVs by adopting strategies to incorporate AWVs into workflows.[6] On the other hand, the complexity of documenting, coding, and billing for an AWV may discourage clinicians from recommending this benefit to their patients.[7] Given the complexity of such possible dynamics, we cannot discount the possibility that patients are becoming increasingly aware of this free benefit and are taking advantage of it.

Our finding of higher AWV rates among Whites compared with other racial/ethnic groups also mirrors results seen in FFS beneficiaries. One study found a wide variation in use of AWV by type of medical practice and the populations they serve. AWV rates were lower in practices that cared for disadvantaged or high-risk populations (e.g., racial minorities, those in rural settings, and those with dual Medicaid and Medicare enrollment).[8]

Because the most common service provided on the same day as an AWV was an E&M visit, we cannot determine if some services delivered, such as lipid panels or ECGs, were preventive or intended to diagnose or manage a health condition. In addition, some researchers suggest that co-billing AWVs with problem-based visits can lead to unexpected cost to patients, especially if patients and providers are not aware of what services are included in the AWV.

Appendix. Services Included in the Annual Wellness Visit

(A)	Administration and/or review of a ***health risk assessment***
(B)	Establishment of, or an update to, the individual's ***medical and family history***
(C)	Establishment of a ***list of current providers*** and suppliers that are regularly involved in providing medical care to the individual
(D)	Measurement of ***height***, ***weight***, ***body mass index*** (or ***waist circumference***, if appropriate), ***blood pressure***, and other routine measurements as deemed appropriate
(E)	***Detection of any cognitive impairment***
(F)*	***Review of risk factors for depression***, including current or past experiences with depression or other mood disorders, based on the use of an appropriate screening instrument for persons without a current diagnosis of depression, which the health professional may select from various available standardized screening tests designed for this purpose and recognized by national medical professional organizations
(G)*	***Review of functional ability and level of safety***, based on direct observation or the use of appropriate screening questions, which the health professional may select from various available screening questions or standardized questionnaires designed for this purpose and recognized by national and professional medical organizations
(H)	The establishment of, or an update to, the following: i. A written ***screening schedule*** for the next 5 to 10 years, as appropriate, based on recommendations of the United States Preventive Services Task Force and the Advisory Committee on Immunization Practices, and the individual's health risk assessment, health status, screening history, and age-appropriate preventive services covered by Medicare ii. A ***list of risk factors and conditions*** for which primary, secondary, or tertiary prevention interventions are recommended or are underway, ***including any mental health conditions*** or any such risk factors or conditions that have been identified through an initial preventive physical examination and a ***list of treatment options*** and their associated risks and benefits
(I)	The furnishing of personalized health **advice** and a **referral**, as appropriate, to ***health education*** or ***preventive counseling services*** or ***programs*** aimed at reducing identified risk factors and improving self-management, or ***community-based lifestyle interventions*** to reduce health risks and promote self-management and wellness, including ***weight loss***, ***physical activity***, ***smoking cessation***, ***fall prevention***, and ***nutrition***
(J)	Furnish ***advance care planning services*** to include discussion about future care decisions that may need to be made, how the beneficiary can let others know about care preferences, and explanation of advance directives, which may involve the completion of standard forms
(K)	Any other element determined appropriate through the national coverage determination process

Source: Patient Protection and Affordable Care Act, H.R. 3590 §4103 (2010).

**Covered only in the first AWV, CPT code G0438.*

Whether the AWV will lead to improvements in the health of older adults is yet to be seen. While our study and another[9] found increased use of preventive services among Medicare enrollees who have an AWV, long-term studies are needed to determine if this translates into improved health outcomes.

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AARP's Public Policy Institute conducted this study using the OptumLabs Data Warehouse. The retrospective administrative claims data utilized in this study include medical claims and eligibility information from a large national U.S. health insurance plan. Individuals covered by this health plan, about 28.2 million (51 percent female) in 2013, are geographically diverse across the United States, with greatest representation in the South and Midwest U.S. Census regions. The health insurance plan provides fully insured coverage for professional (e.g., physician), facility (e.g., hospital), and outpatient prescription medication services. All study data were accessed using techniques that are in compliance with the Health Insurance Portability and Accountability Act (HIPAA) of 1996, and no identifiable protected health information was extracted during the course of the study.