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Prevalence estimates and factors associated with violence among older adults: National Intimate Partner and Sexual Violence (NISVS) Survey, 2016/2017

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Abstract

Abuse of older adults is a public health problem. The National Intimate Partner and Sexual Violence Survey (NISVS) is a nationally-representative, telephone survey for non-institutionalized adults in the United States. To determine the prevalence and factors of intimate partner psychological aggression and physical violence and sexual violence by any perpetrator against older adults, we analyzed NISVS 2016/2017 data ($n = 10,171$, aged ≥ 60 years). Past 12-month prevalence of psychological aggression, physical violence, and sexual violence was 2.1%, 0.8%, and 1.7%, respectively. Odds of psychological aggression were significantly higher among those with hearing or vision impairment, and lower among those aged ≥ 70 years. Odds of physical violence were significantly higher for males and for those with hearing or vision impairment. Odds of sexual violence were significantly higher for unpartnered individuals and those with cognitive impairment; and lower for those aged ≥ 70 years. Epidemiologic studies of violence against older adults can inform population-specific prevention strategies.

Keywords

Abuse of older adults; elder abuse; intimate partner violence; risk factors; sexual violence

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Disclosure statement

The findings and conclusions in this manuscript are those of the authors and do not necessarily represent the official position of the Centers for Disease Control and Prevention.

Introduction

Abuse of older people (or elder abuse) is an important public health problem in the United States. According to the Centers for Disease Control and Prevention (CDC), abuse of older people is an intentional act, or failure to act, that causes or creates a risk of harm to an older adult: defined as someone aged 60 years or older (Centers for Disease Control and Prevention, 2019). The five common types of abuse recognized globally include physical abuse (or physical violence), sexual abuse (or sexual violence), psychological aggression, neglect, and financial abuse. Abuse of older people can lead to suffering, financial loss, long-term psychological trauma, physical injuries, or even death (Carney, 2019; Lachs et al., 1998; World Health Organization, 2022). Published studies found that at least 1 in 10 U.S. non-institutionalized older adults experienced some form of abuse in the prior year (Acierno et al., 2010; Rosay & Mulford, 2017). With the U.S. population rapidly growing older (e.g., estimated 54.1 million adults aged 65 and older in 2019 [Administration for Community Living (ALC), 2021] compared to projected population of 88.5 million by 2050 [Vincent & Velkof, 2021]), the number of abuse cases among older adults is likely to increase significantly (Mohd Mydin et al., 2019).

A study of U.S. adults aged 60 years or older reported that the estimated non-fatal assault rate (per 100,000) increased 75.4% among men (from 77.7 per 100,000 population in 2002 to 136.3 in 2016) and increased 35.4% among women (from 43.8 per 100,000 population in 2007 to 59.3 in 2016) (Logan et al., 2019). Logan et al. (2019) also reported from 2010 to 2016 the homicide rate increased among all men aged 60 and older by 7.1% (from 2.95 to 3.16 per 100,000 population), and a 19.3% increase (from 3.31 to 3.95) was observed among men aged 60–69 years from 2013 to 2016. Logan and colleagues concluded that nearly half of homicides among older adults were perpetrated by a spouse/intimate partner, other relative or acquaintance; and growth in both the older adult U.S. population and rates of violence against this group, especially among men, suggest an important need for violence prevention strategies. In June 2022, the World Health Organization (WHO) published “*Tackling abuse of older people: five priorities for the UN Decade of Healthy Aging 2021–2030*.” The publication assessed the severity of abuse of older people globally and concluded with an investment case for addressing the issue, including generation of data on prevalence and risk and protective factors, and development of interventions to prevent abuse and neglect among older persons (World Health Organization, 2022).

There is a paucity of prevalence data available on abuse of older persons. In the U.S., population-based, cross-sectional studies and surveys of non-institutionalized older adults were conducted more than a decade ago; and prevalence estimates varied widely. Estimates of past-year psychological aggression or emotional abuse ranged from 4.6% to 12.1%; physical violence ranged from 0.2% to 1.7%, and sexual violence ranged from 0.6–0.9% (Acierno et al., 2010; Cannell et al., 2014; Laumann et al., 2008; Rosay & Mulford, 2017). Moreover, previous studies identified risk factors associated with abuse of older persons. For psychological aggression or emotional abuse, associated risk factors were being in a younger age cohort (e.g., 60–69 years), being employed, being married, having experienced a previous traumatic event, and having less social support (Acierno et al., 2010; Amstadter et al., 2011; Pathak et al., 2019; Policastro & Finn, 2017). Additional risk factors included

being a woman, having a functional impairment (Laumann et al., 2008), and living in a household with income below \$30,000 (Burnes et al., 2015). For physical violence, risk factors included being in a younger age cohort and having less social support (Acierno et al., 2010); having a functional impairment or living in a lower-income household (Burnes et al., 2015), and living alone (Pillemer & Finkelhor, 1988; Policastro & Finn, 2017). For sexual violence, risk factors included being a widow or living alone, having experienced previous traumatic event(s), having less social support, and having cognitive impairment (Acierno et al., 2010; Johannesen & LoGiudice, 2013; Shamaskin-Garroway et al., 2017). The limitation with these studies is that they did not use standard definitions and measurements of intimate partner violence and sexual violence, many of the studies occurred more than a decade ago and were limited to samples from specific geographical areas (Amstadter et al., 2011; Burnes et al., 2015; Pillemer & Finkelhor, 1988).

Obtaining accurate prevalence estimates of abuse of older adults in the U.S. is essential to informing the development and implementation of effective prevention strategies (Marshall et al., 2020). Such strategies need to take into account the magnitude of the problem, and key factors potentially placing older individuals at risk of abuse. The current study uses data from the 2016/2017 National Intimate Partner and Sexual Violence Survey (NISVS). NISVS provides past-year prevalence estimates for psychological aggression and physical violence victimization by intimate partners (IP) and sexual violence victimization by any perpetrator among the non-institutionalized U.S. population. Using these data, this study identifies risk factors as well as factors that might mitigate the risk of abuse. Findings from this study can be used to inform the development of prevention strategies for older adults aged 60 years and older.

Methods

Data source

NISVS is an ongoing, nationally representative random-digit-dial (RDD) telephone survey that employs a dual-frame approach including both landlines and cell phones. The survey assesses prevalence and characteristics of sexual violence, stalking, and intimate partner violence victimization among non-institutionalized English- and Spanish-speaking U.S. adults (18+ years of age). NISVS was administered between September 2016 and May 2017 (i.e., the 2016/2017 period), and a total of 27,571 individuals (15,152 women and 12,419 men) completed the survey (Kresnow et al., 2022).

The overall NISVS 2016/2017 response rate was 7.6% (American Association for Public Opinion Research AAPOR, 2016); the cooperation rate (i.e., the proportion of respondents who participated in the survey among those eligible) was 58.6% (American Association for Public Opinion Research AAPOR, 2016). To increase participation and reduce nonresponse bias in a probability-based household survey, NISVS 2016/2017 was designed with two phases of data collection (i.e., primary phase and non-response follow-up phase). Details about the two phases of data collection and the 2016/2017 survey instrument are described in the NISVS 2016/2017 methodology report (Kresnow et al., 2022). The Institutional Review Board of RTI International approved the survey protocol.

Variables and measures

For this study, past year (12-month) experience of IP psychological aggression and physical violence victimization and sexual violence victimization by any perpetrator were examined among NISVS respondents aged 60 years or older. As reported previously (Leemis et al., 2022), IP psychological aggression includes expressive aggression (e.g., insulting, humiliating, or making fun of a partner in front of others) and coercive control and entrapment, which includes behaviors that are intended to monitor, control, or threaten an intimate partner. IP physical violence includes behaviors ranging from being slapped, pushed, or shoved to severe acts that include being hit with a fist or something hard, kicked, hurt by having hair pulled, slammed against something, beaten, burned on purpose, hurt by choking or suffocating, or having a knife or gun used on them. Contact sexual violence by any perpetrator is a combined measure that includes rape, being made to penetrate someone else (males only), sexual coercion, and/or unwanted sexual contact.

Each type of abuse was measured dichotomously as the presence or absence of abuse. Intimate partners included current or ex-spouses, boyfriends, or girlfriends; and people respondents have dated, were seeing, or hooked up with. Experiences of sexual violence included all types of perpetrators (e.g., intimate partners, family members, acquaintances, persons of authority, strangers, and briefly encountered persons). Each form of abuse was defined as whether respondents experienced any abusive behavior during the 12 months prior to taking the survey. This measurement criterion is consistent with previous NISVS publications on abuse of older adults (Black et al., 2011; Rosay & Mulford, 2017).

Demographic variables included in the analysis were age, sex, race/ethnicity, and other characteristics. Demographics reflect respondents' status at the time of taking the survey. Because survey respondents are reporting on experiences over the last 12 months, current demographics (e.g., marital status) could differ from statuses during the reported event(s). Race/ethnicity was categorized as non-Hispanic White vs. all other racial and ethnic groups. This categorization was used in analyses due to small sample sizes in the non-Hispanic Black, Hispanic, non-Hispanic Asian, American Indian or Alaska Native, multiracial, and "other race" response categories. Socioeconomic characteristics included education level and household income. Education level was categorized as having a high school degree or less vs. greater than high school (i.e., some college, Associates degree, college degree, postgraduate study, or degree), or other/unknown education. Annual household income was categorized as less than \$35,000 vs. greater than or equal to \$35,000. For this analysis, marital status was categorized as married or partnered, unpartnered and other/unknown. The unpartnered category included persons who reported being separated, divorced, widowed, or never married. Geographical factors included urban-rural classification and U.S. region of residence. Urban-rural classification was coded as urban vs. rural by using the respondents' county of residence FIPS code and the U.S. National Center for Health Statistics categorizations (U.S. Department of Health and Human Services, Centers for Disease Control and Prevention, National Center for Health Statistics, 2014). Region of residence was coded as Northeast, Midwest, South, and West using U.S. census categorizations (US Census Bureau, Geography Division, 2019).

Health conditions included having serious hearing or vision impairment, impairment in an activity of daily living, and cognitive impairment. Having serious hearing or vision impairment was assessed by answering a “yes” response to either of the following two questions: (1) “Do you have serious difficulty hearing?” and (2) “Are you blind or do you have serious difficulty seeing, even when wearing glasses?” Having impairment in an activity of daily living involved a “yes” response to any of the following three questions: (1) “Do you have serious difficulty walking or climbing stairs?” (2) “Do you have difficulty dressing or bathing?” and (3) “Because of a physical, mental or emotional condition, do you have difficulty doing errands such as visiting a doctor’s office or shopping?” Having cognitive impairment was assessed by one question: “Because of a physical, mental or emotional condition, do you have difficulty concentrating, remembering or making a decision?” Each health condition variable was categorized as “yes” or “no.”

Statistical analyses

SAS (version 9.4) was used to generate unweighted and weighted counts, weighted percentages, and 95% confidence intervals (CIs) for all independent variables. Using the SAS Survey Frequency procedure, we obtained the 12-month weighted prevalence estimates and 95% CIs for IP psychological aggression and IP physical violence, as well as sexual violence by any perpetrator. Weighted prevalence estimates and 95% CIs were produced separately for females and males, along with estimated total number of victims. The SAS Survey Logistic Regression procedure was used to determine associations between each type of abuse and all independent variables and to generate adjusted odds ratios (aORs) and 95% CIs. In the model for psychological aggression and sexual violence, independent variables included age group, sex, race and ethnicity, education, household income, marital status, urban-rural classification, region of residence, having severe hearing or vision impairment, having activity of daily living impairment, and having cognitive impairment. All independent variables were included in multivariable models to reduce potential bias. For the physical violence model, the independent variables included sex, race and ethnicity, education, household income, marital status, having severe hearing or vision impairment, and having activity of daily living impairment. Four independent variables (age group, urban-rural classification, region of residence, and cognitive impairment) were excluded from the physical violence model due to small cell sizes. If the 95% CIs did not include 1.0, the association between the dependent variable and the independent variables was considered statistically significant. Estimates with relative standard errors greater than 30% or a numerator sample count less than 21 were considered statistically unstable and not reported (Kresnow et al., 2022).

Results

A total of 10,171 respondents, representing an estimated 67 million total U.S. population aged 60 years or older were included in the analysis. Table 1 presents characteristics of the total study sample including unweighted counts and weighted percentages with 95% CIs. Among individuals aged 60 years or older, 60.6% were in the 60–69 age group, 54.3% were female, 78.4% were non-Hispanic White, 64.3% reported an education level beyond high school, and 50.9% lived in a household with a total annual income greater than or equal to

\$35,000. More than half (58.6%) of respondents were married or living with a partner. The majority (80.8%) lived in an urban area, and more than a third (37.5%) resided in the South. The percentage of older adults having severe hearing or vision impairment was 22.4%; having activity of daily living impairment was 30.4%; and having cognitive impairment was 11.7%.

Prevalence of past 12-month IP psychological aggression, IP physical violence, and sexual violence

As reported in Table 2, the overall 12-month prevalence of IP psychological aggression was 2.1% (an estimated 1.4 million victims) and IP physical violence was 0.8% (an estimated 512,000 victims). The prevalence of sexual violence by any perpetrator was 1.7% (an estimated 1.1 million victims). Among women aged 60 years or older, the past 12-month prevalence of IP psychological aggression was 1.6% (estimated 570,000 female victims), IP physical violence was 0.4% (estimated 150,000 female victims) and sexual violence was 1.9% (an estimated 701,000 female victims). Among men aged 60 years or older, the past 12-month prevalence of IP psychological aggression was 2.6% (an estimated 806,000 male victims), IP physical violence was 1.2% (an estimated 362,000 male victims) and sexual violence was 1.4% (an estimated 424,000 male victims).

Factors associated with past 12-month IP psychological aggression, IP physical violence, and sexual violence

As shown in Table 3, compared with the 60–69 age group, the 70 and older age group had significantly lower odds of reporting IP psychological aggression (aOR = 0.4; 95% CI = 0.2, 0.6). Older adults reporting severe hearing or vision impairment had significantly greater odds of reporting IP psychological aggression than those without these impairments (aOR = 1.9; 95% CI = 1.2, 3.0). No other factors were significantly associated with reporting IP psychological aggression.

Males had significantly greater odds of reporting IP physical violence than females (aOR = 2.7; 95% CI = 1.4, 5.3); and older persons having severe hearing or vision impairment had significantly greater odds of reporting IP physical violence than those without these impairments (aOR = 2.1; 95% CI = 1.1, 3.9) (Table 3). IP physical violence was not significantly associated with impairments in activities of daily living.

The 70 and older age group had significantly lower odds of reporting sexual violence by any perpetrator than the 60–69 age group (aOR = 0.3; 95% CI = 0.2, 0.6). Unpartnered older adults (aOR = 2.5; 95% CI = 1.5, 4.2) and older adults living in the South (aOR = 2.1; 95% CI = 1.1, 4.2) had significantly greater odds of reporting sexual violence by a perpetrator than married/partnered older adults and those living in the Northeast, respectively. Older adults having cognitive impairment had 3.6 times the odds of reporting sexual violence by any perpetrator (aOR = 3.6; 95% CI = 1.9, 7.0) than those not having this form of impairment. There were no significant associations between sexual violence and having severe hearing or vision impairment or impairment in activities of daily living.

Discussion

Findings from this nationally representative study suggest an estimated 1.4 million (2.1%) adults in the U.S. aged 60 years or older are victims of at least one incident of psychological aggression by an IP in the past 12 months. Over half a million (0.8%) are victims of past-year IP physical violence. Further, an estimated 1.1 million older adults are victims of past-year sexual violence by any perpetrator. Compared to previously published U.S. prevalence estimates, this study reported a lower prevalence of IP psychological aggression (2.1% compared to 4.6%–12.1% reported previously), a comparable prevalence of IP physical violence (0.8% compared to 0.2%–1.7% reported previously), and a higher prevalence of sexual violence (1.7% compared to 0.6%–0.9%) (Acierno et al., 2010; Cannell et al., 2014; Laumann et al., 2008; Rosay & Mulford, 2017). Differences in estimates between this and other studies could be at least partially due to the lack of standard definitions and measurements, as well as the difference in the age ranges of studied population. For example, in two other studies the older population had the same age range as this study which was 60+ years. However, in one study the population was defined as 57–85 years old, while another was 70 + .The difference could also be partially a function of our assessment of psychological aggression and physical violence perpetrators, which only included intimate partners.

The identification of demographic characteristics and health conditions associated with IP psychological and IP physical violence and sexual violence by all perpetrators during the past 12 months reported in this study contributes to an understanding of the context in which these forms of violence occur among older adults. Consistent with previously published studies (Acierno et al., 2010; Laumann et al., 2008), the present study found that adults aged 70 years and older had lower odds of IP psychological aggression and sexual violence than adults aged 60–69. Lachs et al. (2015) suggested that the “young-old” (i.e., ages 60–69 in this study) may live with a spouse or adult children who are considered likely abusers potentially associated with their shared living environment. In the present study, older adults who were unmarried or not in a relationship (e.g., divorced, separated, widowed, or never married) had 2.5 times the odds of experiencing sexual violence than those who were married or living with a partner. This finding is consistent with prior studies suggesting marriages or partnerships lasting into late adulthood may be considered a protective factor of abuse, while being divorced or separated may be associated with unstable, conflictive familial relationships posing greater risk of abuse (Burnes et al., 2015). Several studies suggest indicators of social isolation, including being widowed, divorced, or separated, living alone, and having limited formal or informal contacts, were associated with all forms of abuse, including sexual violence, among older adults (Brozowski & Hall, 2004; Chokkanathan, 2018; De Donder et al., 2016; Dong & Simon, 2013).

The present study also found that males had significantly greater odds of experiencing IP physical violence than females. There were no significant sex differences for IP psychological aggression and sexual violence. Our results are consistent with previous studies (Logan et al., 2019; Melchiorre et al., 2016; Pillemer & Finkelhor, 1988). Those studies suggest that older men may experience higher rates of physical abuse, including physical abuse perpetrated by an intimate partner, because they are more likely to be living

with someone else. In addition, Melchiorre et al. (2016) suggested that abuse among older males is under-recognized, under-detected and under-reported. This is largely due to social/cultural norms supporting traditional male characteristics of fortitude, strength and therefore may tend to overlook the vulnerability of older men.

Older adults in this study with severe hearing or vision impairment had significantly greater odds of reporting IP psychological aggression and IP physical violence, but not sexual violence. According to a literature review, physical disability, including hearing and vision impairments, is one of the strongest predictors of abuse among older adults (Pillemer et al., 2016). Several studies found that older adults with physical vulnerability had greater odds of being victimized through psychological aggression (Anme et al., 2005; Laumann et al., 2008) as well as being victims of physical violence (Burnes et al., 2015). Roberto (2016) reasoned that the association of abuse of older adults and physical impairment could be related to isolation, which can decrease the likelihood that abuse will be detected (Roberto, 2016). Physical limitations may also be associated with reduced victim self-esteem and increased dependency on others for assistance, which are both associated with increased risk of being abused (Kong & Jeon, 2018).

In our study, older adults with cognitive impairment, which included difficulty concentrating, remembering, or making a decision, were at significantly greater risk of sexual violence. This finding is consistent with other studies suggesting cognitive impairment and declining health may be associated with increased vulnerability to abuse (Biggs et al., 2009; Dong et al., 2014; Friedman et al., 2017; Johannesen & LoGiudice, 2013; Roberto, 2016). Cognitive impairment could also increase vulnerability to sexual violence through diminished capacity for sexual consent (White, 2010).

The findings of this study have implications for clinical and prevention practice. Regarding clinical practice, older adults, especially those with physical and mental disabilities, frequently interact with healthcare professionals and these professionals have a vital role in safeguarding older persons from abuse (Abrahams, 2021). Providers, especially nurses, geriatricians, and other medical providers, are among the first groups who come in contact with the older population and can identify and assess cases of abuse (Ranabhat et al., 2022; Shamaskin-Garroway et al., 2017; Yaffe et al., 2008). A systematic review of 14 research articles published between 2010 and 2021 revealed education and training for nurses to detect abuse of older adults can significantly enhance their knowledge and increase identification and reporting of abuse cases (Ranabhat et al., 2022). Older adults experiencing violence victimization use emergency departments and hospitals frequently (Rosen et al., 2023), and these healthcare sites could be an ideal venue for abuse screening, especially among older adults with physical and mental health disabilities identified as risk factors in this study (Abujarad et al., 2020; Choo et al., 2021; Yaffe et al., 2008). From a prevention practice perspective, there are no rigorously evaluated interventions to prevent the occurrence or recurrence of abuse against older adults, including intimate partner violence and sexual violence (Atkinson & Roberto, 2023; Baker et al., 2016; Marshall et al., 2020). The CDC has compiled the best available evidence, including strategies and approaches for preventing intimate partner violence (Niolon et al., 2017) and sexual violence (Basile et al., 2016). Prevention strategies that could be implemented or adapted to prevent these

forms of violence among older adults include promoting social norms to protect against violence (e.g., bystander approaches), teaching safe and healthy relationship skills (e.g., healthy relationship programs for older adult couples), creating protective environments (e.g., modifying physical and social environments of neighborhoods and other place-based approaches to prevent violence within communities), strengthening economic supports for families (e.g., household financial security), and supporting victim and survivors to increase safety and lessen harms (e.g., victim-centered services). Although these strategies were not specifically developed and evaluated to address the prevention of abuse among older adults, it may be the case that these programs, policies, and practices could have preventive effects in reducing IP psychological aggression, IP physical violence, and sexual violence addressed in this study. There remains an urgent need for future research to develop and rigorously evaluate approaches or adapt existing interventions to prevent abuse specifically against older adults (Marshall et al., 2020; World Health Organization, 2022). Future research could be informed by the findings of this study.

This study is subject to several limitations. First, estimates generated from the 2016/2017 NISVS data should be considered underestimates of the true prevalence. Participants might not have felt comfortable disclosing their victimization to a live interviewer for several reasons including the sensitivity of intimate partner and sexual violence, stigma, self-blame, or having an abuser nearby when they completed the interview. Second, the findings cannot be generalized to institutionalized populations as the NISVS sample did not include persons living in a residential, nursing, or memory care facility. Third, NISVS data are cross-sectional, so the directionality of the victimization and health conditions cannot be determined. Further, although the NISVS survey content is comprehensive, it does not include other forms of abuse experienced by older persons including financial abuse, physical and psychological abuse by non-intimate partners, and neglect. Additionally, recall bias may have affected the accuracy of reporting past 12-month victimization, because some respondents may not recall the timing of their victimization. Relatedly, memory impairments might have prevented some participants from reporting their victimization (Dong et al., 2011).

The NISVS data included in this report did not allow for the examination of inequities in intimate partner and sexual violence by race and ethnicity due to small cell sizes among respondents in racial and ethnic minority groups. Although overall prevalence estimates of intimate and sexual violence are reported for men and women, statistical instability due to small cell sizes did not permit stratified estimates of contextual factors associated with these forms of violence by sex. Future surveillance efforts to oversample such groups could inform whether inequities in violence exist and among which populations to inform prevention efforts. Finally, common with recent random-digit-dial studies, the response rate was low (i.e., 7.8%). However, response rates are not necessarily an indication of low population representativeness. Efforts were made in the NISVS 2016/2017 survey to address the possibility of non-response and noncoverage bias (e.g., non-response follow-up phase), and comparisons to external benchmarks showed similar estimates (Kresnow et al., 2022).

Conclusion

Notwithstanding the specified limitations, this study reports prevalence estimates of past 12-month IP psychological aggression, IP physical violence, and sexual violence by any perpetrator of U.S. adults aged 60 years and older. This study identified demographic and other health-related factors that were associated with these forms of abuse. These results support the importance and urgency of developing and adapting violence prevention strategies for this growing population within the U.S.

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Data availability statement

Historical data (2010–2015) from the National Intimate Partner and Sexual Violence Survey have been made available via the University of Michigan Inter-university Consortium for Political and Social Research data repository. The data used to conduct this study have not yet been made publicly available but are being prepared by CDC for public release. The corresponding author, [HZK], will provide information about the availability of the data and under what conditions the data can be accessed upon its release.

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Table 1.

Characteristics of respondents aged 60 years and older, National intimate partner and sexual violence survey (NISVS), 2016/2017 ($N = 10,171$).

		Unweighted Counts	Weighted	Estimates
		N	Weighted %	95% CI
Age group	60–69	5,889	60.6	(58.9,62.3)
	≥70	4,282	39.4	(37.7,41.1)
Sex	Female	5,827	54.3	(52.6,56.1)
	Male	4,344	45.7	(43.9,47.4)
Race/Ethnicity	Non-Hispanic White	8,451	78.4	(76.9,79.9)
	All Other Racial/Ethnic Groups *	1,720	21.6	(20.1,23.2)
Education [‡]	High school or less	2,505	35.6	(33.8,37.4)
	>High school	7,650	64.3	(62.5,66.0)
Household income [‡]	<\$35,000	3,231	39.5	(37.7,41.3)
	≥\$35,000	5,979	50.9	(49.2,52.7)
Marital status	Married or partnered	5,500	58.6	(56.9,60.3)
	Unpartnered **	4,637	41.1	(39.4,42.8)
	Other	34	0.3	(0.2,0.5)
Urban-rural classification [‡]	Urban	7,528	80.8	(79.5,82.1)
	Rural	2,530	18	(16.8,19.3)
Region	Northeast	2,012	18.5	(17.2,19.9)
	Midwest	2,099	22	(20.7,23.4)
	South	3,383	37.5	(35.9,39.0)
	West	2,677	22	(20.8,23.4)
Having severe hearing or vision impairment	No	8,091	77.6	(76.1,79.0)
	Yes	2,080	22.4	(21.0,23.9)
Having activity of daily living impairment	No	7,588	69.6	(67.9,71.3)
	Yes	2,583	30.4	(28.7,32.1)
Having cognitive impairment	No	9,151	88.3	(87.2,89.4)
	Yes	1,020	11.7	(10.6,12.8)

N = sample size; CI = confidence interval.

* “All Other Racial/Ethnic Groups” includes non-Hispanic Black, Hispanic, Non-Hispanic Asian, Non-Hispanic American Indian or Alaska Native, Non-Hispanic Multiracial and all other responses.

[‡] Invalid/missing category was removed.

** “Unpartnered” includes persons who reported being separated, divorced, widowed, or never married.

Table 2.

Prevalence of past 12-month intimate partner (IP) psychological aggression, IP physical violence and sexual violence by sex among respondents aged 60 years and older, National intimate partner and sexual violence survey (NISVS), 2016/2017.

	Abuse type	Unweighted N	Weighted % (95% CI)	Estimated Number of Victims
Overall	IP Psychological aggression	205	2.1 (1.6,2.6)	1,376,000
	IP Physical violence	90	0.8 (0.6,1.1)	512,000
	Sexual violence by any perpetrator	172	1.7 (1.3,2.1)	1,124,000
Female	IP Psychological aggression	99	1.6 (1.1,2.2)	570,000
	IP Physical violence	35	0.4 (0.3,0.6)	150,000
	Sexual violence by any perpetrator	106	1.9 (1.4,2.6)	701,000
Male	IP Psychological aggression	106	2.6 (1.9,3.6)	806,000
	IP Physical violence	55	1.2 (0.8,1.8)	362,000
	Sexual violence by any perpetrator	66	1.4 (1.0,2.0)	424,000

N = sample size; CI = confidence interval.

Table 3.

Demographic characteristics and Health conditions associated with past 12-month intimate partner (IP) psychological aggression, IP physical violence, and sexual violence among respondents aged 60 years and older, National Intimate Partner and Sexual Violence Survey (NISVS), 2016/2017.

		IP Psychological Aggression [†]	IP Physical Violence [‡]	Sexual Violence by Any Perpetrator [†]
		aOR (95% CI)		
Age group	60–69	ref	-	ref
	≥70	0.4 (0.2,0.6)	-	0.3 (0.2,0.6)
Sex	Female	ref	ref	ref
	Male	1.5 (0.9,2.3)	2.7 (1.4,5.3)	0.8 (0.5,1.3)
Race/Ethnicity	Non-Hispanic White	ref	ref	ref
	All Other Racial/Ethnic Groups [*]	1.0 (0.5,1.8)	1.9 (0.9,4.0)	1.2 (0.7,2.1)
Education	High school or less	1.0 (0.5,2.0)	0.7 (0.3,1.4)	0.7 (0.4,1.3)
	>High school	ref	ref	ref
Household income	<\$35,000	0.7 (0.4,1.4)	1.2 (0.5,3.1)	1.5 (0.8,2.5)
	≥\$35,000	ref	ref	ref
Marital status	Married or partnered	ref	ref	ref
	Unpartnered	0.9 (0.6,1.6)	1.2 (0.5,2.7)	2.5 (1.5,4.2)
Urban-rural classification	Urban	ref	-	ref
	Rural	0.7 (0.4,1.3)	-	1.6 (0.9,2.9)
Region	Northeast	ref	-	ref
	Midwest	1.4 (0.7,2.8)	-	1.2 (0.5,2.8)
	South	1.6 (0.9,3.0)	-	2.1 (1.1,4.2)
	West	0.8 (0.4,1.7)	-	0.8 (0.3,1.7)
Having severe hearing or vision impairment	Yes	1.9 (1.2,3.0)	2.1 (1.1,3.9)	1.0 (0.5,1.7)
	No	ref	ref	ref
Having activity of daily living impairment	Yes	0.9 (0.6,1.5)	1.3 (0.7,2.4)	1.3 (0.7,2.3)
	No	ref	ref	ref
Having cognitive impairment	Yes	1.5 (0.8,2.7)	-	3.6 (1.9,7.0)
	No	ref	-	ref

aOR = adjusted odds ratio; CI = confidence interval. Results in **boldface** type were considered statistically significant when 95% CI did not include 1.0.

^{*} “All Other Racial/Ethnic Groups” includes non-Hispanic Black, Hispanic, Non-Hispanic Asian, Non-Hispanic American Indian or Alaska Native, Non-Hispanic Multiracial and all other responses.

- Estimates with relative standard errors greater than 30% or a numerator sample count less than 21 were considered statistically unstable and not reported (Basile et al., 2022).

[†]IP psychological aggression and sexual violence by any perpetrator model were adjusted for age group, sex, race and ethnicity, education, household income, marital status, urban-rural classification, region of residence, having severe hearing or vision impairment, having activity of daily living impairment, and having cognitive impairment.

[‡]IP physical violence model was adjusted for sex, race and ethnicity, education, household income, marital status, having severe hearing or vision impairment, and having activity of daily living impairment. Four independent variables – age group, urban-rural classification, region of residence, and cognitive impairment – were excluded from the physical violence model due to small cell sizes.

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