Using a Public Health Lens to Advance Health Equity in Alzheimer’s and Other Dementias

INSTRUCTOR GUIDE
• **About the Health Equity Module:** Provides a brief overview of the health equity module and how it fits within the larger public health curriculum on Alzheimer’s and other dementias.

  ▪ **Learning Objectives:** Lists 5 learning objectives for a participant completing this module.

• **Competencies:** Lists competencies met by this module from AGHE/GSA; CEPH; Council on Linkages; and PHAB.

• **Layout of Health Equity Module Instructor Guide:** Outlines the sections of the Instructor Guide as well as how to use the materials.

• **Participant Engagement Options:** Includes supplementary resources that are designed to increase participant engagement and enhance understanding of the concepts covered in this module.

  ▪ **Discussion Questions:** Provides several questions to be used before participants complete the module and after participants complete the module.

  ▪ **Learning Activities:** Provide several interactive, application-based activities participants can use to apply and integrate knowledge from the module into their life.

  ▪ **Sample Test Questions:** Provides multiple choice and true/false questions that could be used to assess knowledge based on the content in the module.

  ▪ **Case Studies:** Copy of the case studies and accompanying knowledge checks that are in the module. Additional discussion questions for each case study are provided as well.

  ▪ **Video Resources:** Link to videos that are used throughout the module. Additional discussion questions for each video are provided as well.

  ▪ **Graphic Resources:** Copies of the graphics that are used in the module. Additional discussion questions and activities for each graphic are provided as well.

  ▪ **Additional Readings and Resources:** The list of additional resources that is included in the module that could be used for supplementary activities or reading by participants.

• **Appendix A:** Copy of the sample test questions without correct answers included for ease of printing.
ABOUT THE HEALTH EQUITY MODULE

This one-hour course, *Using a Public Health Lens to Advance Health Equity in Alzheimer’s and Other Dementias*, is designed for public health students, educators and professionals and is part of the larger Healthy Brain Initiative curriculum, *A Public Health Approach to Alzheimer’s and Other Dementias*. This suite of training modules was developed for the Alzheimer’s Association by the Emory Centers for Public Health Training and Technical Assistance with support from the Centers for Disease Control and Prevention (CDC).

*Using a Public Health Lens to Advance Health Equity in Alzheimer’s and Other Dementias* approaches health equity in Alzheimer’s disease and other dementias from a population-based, life course approach to reduce risk and ensure that everyone can live their best life after a diagnosis. Participants can use this learning module format at their own independent pace, without any supplementary work or guidance from an instructor, presenter, or trainer. The module can also be used as a base for training, assignments, group projects or class discussion. This guide contains supplementary materials to support any additional activities that might be done external to the module itself. This module contains the following 12 topics which address five learning objectives:

**Topics:**

1. The Growing Impact of Alzheimer’s Disease
2. Defining Health Equity
3. Health Inequities and the Social Determinants of Health
4. Identifying Inequities in Alzheimer’s and Other Dementias
5. Social Determinants of Health Case Studies
6. Modifiable Risk Factors and Structural Barriers
7. Life Course Approach and the Social Ecological Model
8. Equity in Action
9. Impacting Communities
10. Strategies You Can Use
11. Next Steps
12. Learn More

**Learning Objectives:**

1. Define key terms including health disparity, health inequity and health equity.
2. Identify at least two health inequities related to Alzheimer’s and other dementias.
3. Describe how social determinants of health affect the risk for dementia and early diagnosis of Alzheimer’s and other dementias.
4. Describe the role public health professionals play in response to health equity and Alzheimer’s and other dementias.
5. Identify opportunities for public health dementia interventions within communities.
The Health Equity Module promotes basic learning that supports the development of certain competencies and public health accreditation standards.

**Academy for Gerontology in Higher Education (AGHE, through GSA):**

- **I.1.1:** Employ the Lifespan/Lifecourse perspective to appreciate age over time in relation:
  - To the human life cycle and stages of growth and development within the social context
  - To life transitions and adaptive resources
  - To the historical context of cohorts
  - To age, gender, race, and socioeconomic status within social environments

- **I.2.4:** Recognize common late-life syndromes and disease and their related bio-psycho-social risk and protective factors.

- **I.3.3:** Demonstrate knowledge of signs, symptoms, and impact of common cognitive and mental health problems in late life (e.g., dementia, depression, grief, anxiety).

- **I.4.2:** Assess the impact of inequality on individual and group life opportunities throughout the lifespan/course impacting late-life outcomes.

- **II.1.3:** Assess and reflect on one’s work in order to continuously learn and improve outcomes for older persons.

- **II.2.3:** Respect cultural values and diversity.

- **II.4.5:** Provide the following groups information and education in order to build a collaborative aging network:
  - Key persons in the community (e.g., police officers, firefighters, mail carriers, local service providers and others)
  - Aging workforce professionals and personnel (e.g., paid and unpaid; full- and part-time) in the field of aging.

- **II.7.2:** Analyze policy to address key issues and methods to improve the quality of life of older persons and their caregivers/families.
Council on Education for Public Health (CEPH) Foundational Competencies:

- 4. Interpret results of data analysis for public health research, policy, or practice.
- 6. Discuss the means by which structural bias, social inequities and racism undermine health and create challenges to achieving health equity at organizational, community, and systemic levels.
- 8. Apply awareness of cultural values and practices to the design, implementation, or critique of public health policies or programs.
- 20. Describe the importance of cultural competence in communicating public health content.

Council on Linkages Between Academia and Public Health Practice (supported by ASPPH):

- 1.1: Describes factors that affect the health of a community.
- 4.1.4: Demonstrates principles of ethics, diversity, equity, inclusion, and justice in all interactions with individuals, organizations, and communities.
- 4.3.2: Describes how diversity influences policies, programs, services, and the health of a community.
- 4.6.4: Contributes to implementation of strategies for achieving and sustaining a diverse, inclusive, and competent public health workforce.
- 8.1.5: Describes public health as part of a larger inter-related system of organizations that influence the health of populations at local, national, and global levels.
- 8.7.3: Demonstrates the essential role of diversity, equity, inclusion, and justice in promoting and protecting health in a community.

Public Health Re-accreditation Standards (PHAB):

- 3.2: Use health communication strategies to support prevention, health, and well-being.
- 8.2: Build a competent public health workforce and leadership that practices cultural humility.
  - 8.2.3 S: Support efforts of Tribal and local health departments to strengthen the public health workforce.
HOW TO USE THE MATERIALS:

• This module is part of a larger curriculum where each module is designed for use either as part of a complete set or as a stand-alone module.

• Participants can use the module at their own independent pace, without any supplementary work or guidance from an instructor, presenter, or trainer. The module can also be used as a base for training, assignments, group projects or class discussion. In addition to the module content, this guide has supplementary materials to support activities used in a class setting.

• This is meant as a flexible guide that instructors can adapt to fit their needs.

• The module itself will take approximately 60–90 minutes to complete. If including the supplementary materials, time will vary depending on participant engagement, instructor style and the activities included.

• Discussion questions, learning activities, sample test questions, case studies, video resources with questions, graphic resources, and additional reading and resources are also included in this guide. These may be modified or removed at the discretion of the instructor. Questions may also be used for other activities such as small group discussion or individual writing assignments. Many of the questions will directly reference specific sections in the module, so participants may benefit from having discussion questions or learning activities prior to beginning the module.

• Module content can be downloaded from the module to be used as a reference.

• All materials are 508 compliant. (Note: if changes are made to the supplementary materials, it is recommended that changes continue to follow 508 compliance guidelines. For more information on 508 compliance, visit the Department of Health and Human Services website: https://www.hhs.gov/web/section-508/index.html)
This guide is laid out in the following sections:

- **Participant Engagement Options:** Includes supplementary resources that are designed to increase participant engagement and enhance understanding of the concepts covered in this module.
  - **Discussion Questions:** Provides several questions to be used before participants complete the module and used after participants complete the module.
  - **Learning Activities:** Provide several interactive, application-based activities participants can use to apply and integrate knowledge from the module into their life.
  - **Sample Test Questions:** Provides multiple choice and true/false questions that could be used to assess knowledge based on the content in the module.
  - **Case Studies:** Copy of the case studies and accompanying knowledge checks that are in the module. Additional discussion questions for each case study are provided as well.
  - **Video Resources:** Link to videos that are used throughout the module. Additional discussion questions for each video are provided as well.
  - **Graphic Resources:** Copies of the graphics that are used in the module. Additional discussion questions and activities for each graphic are provided as well.
  - **Additional Readings and Resources:** The list of additional resources that is included in the module that could be used for supplementary activities or reading by participants.
- **Appendix A:** Copy of the sample test questions without correct answers included for ease of printing.
These supplementary resources are designed to increase participant engagement and enhance understanding of the concepts covered in this module. These include discussion questions, learning activities, a series of case studies, additional reading and a list of video resources. It is recommended that the instructor review these resources to determine which of these additional materials would be useful in illustrating the concepts covered in the module.

**DISCUSSION QUESTIONS**

The following discussion questions may be useful for engaging learners before or after module completion:

**Before completing the module:**

- Think about those in your life who may need care now or in the future. What are some things to consider if someone is diagnosed with Alzheimer’s or another dementia?

- How do you define health equity? How do you think health equity or inequity might impact Alzheimer’s and other dementias? What would be helpful for you to know in starting a conversation with someone about health equity and Alzheimer’s or other dementias?

- What are some social determinants of health? How might these social determinants of health be related to Alzheimer’s and other dementias?

- What health inequities are you aware of among different communities? What health inequities might be present in communities related to Alzheimer’s and other dementias?

- What are some interventions across the life course that can be traced back to public health? How might these be related to Alzheimer’s and other dementias? An example to start with may be seat belt laws.

- What is the social ecological model? How might it be used to impact health equity in Alzheimer’s and other dementias?

**After completing the module:**

- Imagine you or someone you care about is diagnosed with Alzheimer’s or another dementia. What are some social determinants of health that may have influenced the risk for developing Alzheimer’s or other dementias?

- Imagine someone tells you that health equity is not important for someone who has a diagnosis of Alzheimer’s or other dementias. How would you respond?

- Imagine you work at a local or state health department. Consider the life course approach to public health, health equity and Alzheimer’s disease. How can other areas of public health be engaged to support health equity in Alzheimer’s and other dementias?

- Consider some of the communication strategies discussed in the module. What communication strategies would you be interested in using to advance the conversation about health equity in Alzheimer’s and other dementias?

- Think about the Next Steps listed in the module. Which of these feels actionable to you? What will your next step be?
The following learning activities may be used or adapted to enhance learning:

• Observe the community in which you live, work or go to school. What are some social determinants of health that may contribute to health equity or inequity? What are ways that they might impact people’s risk or protective factors for Alzheimer’s or other dementias? What changes would need to be made to improve health equity?

• Create a diagram, interactive tool, or resource to explain the interactions between health equity, health inequity, and the social determinants of health for Alzheimer’s and other dementias. Provide one example of how a social determinant of health fits into the resource you create.

• Select a workforce (e.g., public health, health care, first responder) that would benefit from health equity training on Alzheimer’s and other dementias. Create an outline of training topics—What information would you present? What educational techniques would you use during the training?

• Watch the videos below from two different cultures: Asian American and American Indian. Describe some ways you would work to incorporate cultural humility into public health messaging and programming for each of the cultures.
  - Asian American: https://vimeo.com/268811803/6745380c62
  - American Indian: https://vimeo.com/279478897/788d394e8f

• Draft potential next steps for one of the examples of Equity in Action. Identify why you selected the example you did; whether it is at the local, state, or national level; and 3-5 possible next steps they could take to continue furthering health equity in Alzheimer’s and other dementias.

• Choose an underserved population listed under Acknowledging health inequities and Alzheimer’s on the Alzheimer’s Association’s Diversity, Equity and Inclusion page. Create a fact sheet or infographic about the impact of Alzheimer’s and other dementias, and resources or successes being done in that community.
SAMPLE TEST QUESTIONS

The correct answer and explanation are included below each question. Test questions without correct answers are included as Appendix A for ease of printing.

1. Alzheimer’s and other dementias are a growing public health priority because
   A. Current projections are that 13.9 million people aged 65 years and older will be living with dementia in 2060.
   B. Between 2000 and 2019, the number of Alzheimer’s deaths increased at the same rate as other major diseases, including heart disease, stroke, and HIV.
   C. Annual costs related to Alzheimer’s are projected to increase to just under $1 trillion in 2050.
   D. A & C
   E. All of the above.

_The correct answer is D._ Between 2000 and 2019, the number of Alzheimer’s deaths increased by 145%, while deaths from other major diseases, including heart disease, stroke, and HIV, **decreased**.

2. Health equity is
   A. The attainment of the highest level of health for all people.
   B. Providing the same opportunities to all people.
   C. Acknowledging the underlying causes of health disparities and motivating action through the belief that those systems can be changed.
   D. A & C
   E. All of the above.

_The correct answer is D._ Health equity is defined as the attainment of the highest level of health for all people, acknowledges the underlying causes of health disparities, and motivates action through the belief that those systems can be changed. _Equality_ means providing the same opportunities to all people.

3. Health inequities
   A. Adversely affect groups of people who have systematically experienced greater obstacles to health based on certain characteristics.
   B. Cannot be changed
   C. Only impact a few groups of people that should be prioritized for making impact.
   D. A & B
   E. All of the above.

_The correct answer is A._ Health inequities adversely affect groups of people who have systematically experienced greater obstacles to health based on certain characteristics.
4. Social determinants of health
   A. Are unrelated to health equity in Alzheimer’s and other dementias.
   B. Are limited to the physical environment, including housing, access to healthy food and safe neighborhoods.
   C. Make up the environment in which people are born, live, learn, work, play, worship and age.
   D. A & C
   E. All of the above.

The correct answer is C. The social determinants of health make up the environments in which people are born, live, learn, work, play, worship and age.

5. Social determinants of health that may increase risk of developing Alzheimer’s and other dementias include
   A. Not having access to healthy food or safe, affordable housing.
   B. Not having access to health care coverage.
   C. Having strong relationships with friends, family and coworkers.
   D. A & B
   E. All of the above.

The correct answer is D. The social determinants of health that may increase risk of developing Alzheimer’s and other dementias include not having access to healthy food, safe and affordable housing, and health care coverage. Having strong relationships with others is a social determinant of health that may reduce risk of developing Alzheimer’s and other dementias.

6. Examples of health inequities related to Alzheimer’s and other dementias include
   A. When Black or Hispanic adults are diagnosed with Alzheimer’s disease, it is often in the later stages of dementia.
   B. Among caregivers for people living with dementia, two-thirds are women.
   C. Transgender and nonbinary individuals with subjective cognitive decline who reported discrimination in medical settings were more likely to have poor or fair memory than those who did not experience discrimination.
   D. A & B
   E. All of the above.

The correct answer is E. Transgender and nonbinary individuals with subjective cognitive decline who reported discrimination in medical settings were more likely to have poor or fair memory than those who did not experience discrimination.
7. Intersectionality in health equity
   A. Does not require professionals to consider all dimensions of people and their communities.
   B. Is an approach or lens that recognizes that health is shaped by a multi-dimensional overlapping of factors.
   C. Acknowledges that someone who identifies as a Black female caregiver may experience different health inequities than someone who identifies as a Black male caregiver or an Asian American female caregiver.
   D. B & C
   E. All of the above

   The correct answer is D. Intersectionality in health equity is an approach or lens that recognizes that health is shaped by a multi-dimensional overlapping of factors such as race, class, income, education, age, ability, sexual orientation, immigration status, ethnicity, indigeneity and geography. This acknowledges that people with different identities will experience different health inequities.

8. Public health professionals can engage with health equity in Alzheimer’s and other dementias by
   A. Moving funding from Women Infant Children programs to Aging Services.
   B. Recognizing that cardiovascular health and brain health are unrelated topics.
   C. Supporting seatbelt and helmet use and quit smoking campaigns.
   D. A & B
   E. All of the above

   The correct answer is C. Dementia and public health can interact throughout a person’s life by connecting brain health to other public health campaigns.

9. Use the words from the word bank to fill in the statements below regarding levels of influence in the Social Ecological Model.

   WORD BANK: Public Policy  •  Interpersonal  •  Community  •  Individual  •  Organizational
   A. National, state, local laws and regulations fall in the realm of Public Policy.
   B. Relationships between organizations help make up a Community.
   C. Organizations and social institutions interact at the Organizational level.
   D. Families, friends and social networks form Interpersonal relationships.
   E. Knowledge, attitudes and skills are held by the Individual.
10. True or False: Utilizing strategies that act across multiple levels of the social ecological model at the same time is unlikely to achieve long-term population-level impact.
   • *The correct answer is False.* Utilizing strategies that act across multiple levels of the social ecological model at the same time is *likely* to achieve long-term population-level impact.

11. True or False: When creating partnerships, partners can come from a variety of sectors, including government, education, business, public services, faith communities and funders.
   • *The correct answer is True.* Partnerships can come from a variety of sectors.

12. True or False: When soliciting feedback, it is important to prioritize having representation from diverse groups of those living with dementia and caregivers.
   • *The correct answer is True.* Listening to the voices of people and organizations in the community who experience the issue being addressed – that is, people who are disproportionately affected by dementia – can help create a better understanding of the social determinants contributing to health inequities and inform more effective solutions.

13. True or False: Culturally responsive information should be in the language most spoken by your constituents, avoid stereotypes and be in accessible formats for people with disabilities.
   • *The correct answer is True.* Culturally responsive information should be accessible to your constituents.

14. What are possible next steps to take to learn more or get involved in health equity in Alzheimer’s and other dementias?
   A. Sign up for CDC’s Alzheimer’s Disease and Healthy Aging newsletter.
   B. Consider volunteering with community partners in your area.
   C. Evaluate diversity, equity and inclusion internally in your organization and make changes accordingly.
   D. Explore caregiver and cognitive decline data in your state, learn about public health actions and initiatives and share what you learn with others.
   E. All of the above.

*The correct answer is E.* All of the above actions are next steps to take to learn more or get involved in health equity in Alzheimer’s and other dementias.
These are the case studies and knowledge checks that are used in the module. Additional discussion questions are included as supplementary resources to be used in your learning environment. Possible answers are provided in italics with the discussion questions, but answers are not necessarily exhaustive or comprehensive.

**CASE STUDY 1: Urban County**

Urban County has a racially and ethnically diverse population of 3 million. Some of this diversity comes from its immigrant population who make up 23% of the county’s population and contribute to the variety of languages spoken. In its mixed economy, residents participate in a variety of occupations and industries, including agriculture, manufacturing, tourism, and health care. Average household income is $76,000 and 14% of people live in poverty. (The national average of people living in poverty is 11.6%) Most people (80%) over the age of 25 have at least a high school diploma and over a third (34%) have a Bachelor’s degree. People in the county have advocated for changes to improve walkability, food access, and green spaces, as there are stark differences between neighborhoods. A quick internet search will show there are several neurologists and specialty clinics for dementia, but you have heard that most have roughly a six-month waiting period to see someone.

**Knowledge Check**

1. What are some social determinants of health that may lead to increased health inequities in dementia for residents of Urban County?
   A. Lower income
   B. Decreased walkability
   C. Frequent language barriers
   D. Decreased health care access
   E. Formal educational achievement

   The correct answers are A, B, C, and D. Formal educational achievement may contribute to increased health equity, not health inequities.

**Discussion Questions**

1. What are some social determinants of health that may instead lead to increased health equity for people living in Urban County?
   A. Economic stability through mixed economy; may have health care providers practicing in a variety of languages; community activism/social support; neurologists and specialty clinics are nearby.

2. How might these social determinants of health vary for different people within Urban County?
   A. People living in different neighborhoods may have different health outcomes because of their built environments; some economic sectors may be more stable than others or impact people’s health differently (for example, agriculture vs. tourism); occupation may influence health care access, which may influence ability to see a neurologist or specialist, regardless of the waiting period; English speakers may have an easier time navigating the health care system, even if some materials or services are available in other languages.
3. Why is it important to understand the social determinants of health for Urban County in addressing health equity in Alzheimer’s and other dementias?

A. Social determinants of health can impact policy initiatives or actions (for example, when implementing developments or infrastructure changes or when considering clinic locations or languages spoken by staff hired); Encourages cultural humility and wrap around support services (rather than blaming the individual for their circumstances or impacts of those circumstances that may be out of their control); Builds off strengths, such as community activism; Provides direction for public health interventions (such as economic sectors to engage in Alzheimer’s and other dementias programming).

CASE STUDY 2: Rural State

Rural State has a population of 5 million people spread over 100,000 square miles or about 6 people per square mile. While people move and stay there for the wide-open spaces and fresh air, there is limited access to health care specialists, and limited transportation to access the available providers. The economy is largely agricultural, and 83% of the population identifies as White, while 10% of the population identifies as Latino. Though most households have access to the internet, 15% do not. Nearly 1 in 5 people (18%) are aged 65 years and older. Some of the smaller towns fluctuate in size with the boom/bust cycles of the economy while more rural areas have remained stable with generations of families continuing to live and work in the same communities. For rural residents, accessing grocery stores and schools can require driving 50 miles or more, and many choose to have gardens to supplement their trips to town.

Knowledge Check

1. What are some social determinants of health that may lead to increased health inequity in dementia for residents of Rural State?
   A. Lack of accessible transportation
   B. Increased social support
   C. Economic instability
   D. Lack of access to food
   E. Lack of internet access

The correct answers are A, C, D, and E. Increased social support may contribute to increased health equity, not health inequity.

Discussion Questions

1. What are some social determinants of health that may instead lead to increased health equity for people living in Rural State?
   A. Social support from stable families and communities; access to vegetables from gardens; good air quality
2. How might these social determinants of health vary for different people within Rural State?
   A. Latino populations may experience discrimination in different sectors (education, economic, health care, etc.); Distance from town may impact access to education, health care, food, etc.; Boom/bust cycle may impact economic stability for some workers and communities; Lack of internet access may make accessing education and healthcare services difficult; Older adults access to health care, social opportunities and food may be impacted by lack of transportation options if they can no longer drive.

3. Compare and contrast the social determinants of health that impact health equity in the Urban County and Rural State, using the graphic organizer below (or a Venn Diagram), acknowledging that the social determinants of health may impact health equity differently for people in different communities.

<table>
<thead>
<tr>
<th>Urban County</th>
<th>Both</th>
<th>Rural State</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Frequent language barriers</td>
<td>• Access to healthy foods</td>
<td>• Lack of transportation</td>
</tr>
<tr>
<td>• Economic stability</td>
<td>• Reduced walkability</td>
<td>• Economic instability</td>
</tr>
<tr>
<td>• Formal educational achievement</td>
<td>• Experiences of discrimination</td>
<td>• Lack of health care providers</td>
</tr>
<tr>
<td></td>
<td>• Social supports</td>
<td>• Lack of internet access</td>
</tr>
<tr>
<td></td>
<td>• Access to health care</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Access to education</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Income</td>
<td></td>
</tr>
</tbody>
</table>

4. Why is it important to understand the social determinants of health for Rural State in thinking about addressing health equity in Alzheimer’s and other dementias in this community?
   A. Social determinants of health can impact policy initiatives or actions (for example, when implementing developments or infrastructure changes or when considering clinic locations or languages spoken by staff hired); Encourages cultural humility and wrap around support services (rather than blaming the individual for their circumstances or impacts of those circumstances that may be out of their control); Builds off strengths, such as community social support; Provides direction for public health interventions (such as economic sectors or community organizations to engage in Alzheimer’s and other dementias programming).
These are videos that are used throughout the Health Equity module. Consider playing them in your learning environment and using them for discussion or reflection among the learners. Possible discussion or reflection questions are included below each video title/link. Possible answers are shown where appropriate in italics, but answers are not necessarily exhaustive or comprehensive.

1. Lessons Learned After a Diagnosis of Alzheimer’s or Other Dementia:
   a. What surprised you about the people in this video?
   b. What biases about people with Alzheimer’s or other dementias may be challenged by those in this video?
   c. Why do you think this module begins with watching this video?
   d. This video centers people with Alzheimer’s and other dementias. Why is that important when working to advance health equity among people with Alzheimer’s and other dementias?
   e. What are ways this video could be improved?

2. 2023 Alzheimer’s Disease Facts and Figures:
   a. What are three statistics about Alzheimer’s disease and other dementias that surprised you in this video?
      i. Statistics that are included in the video:
         1. More than 6 million Americans are living with Alzheimer’s.
         2. 1 in 3 seniors dies with Alzheimer’s or another dementia.
         3. It kills more people than breast cancer and prostate cancer combined.
         4. In 2023, Alzheimer’s and other dementias will cost the nation $345 billion. By 2050, these costs could rise to nearly $1 trillion.
         5. Over 11 million Americans provide unpaid care for people with Alzheimer’s or other dementias.
         6. The lifetime risk for Alzheimer’s at age 45 is 1 in 5 for women and 1 in 10 for men.
         7. While only 4 in 10 would talk to their doctor right away when experiencing early memory or cognitive loss, 7 in 10 would want to know early if they have Alzheimer’s disease if it could allow for earlier treatment.
   b. How does this video present the public health imperative for engaging in Alzheimer’s and other dementias?
      i. Prevalence, mortality, comparison to other health conditions, increasing incidence, cost to society, impact on caregivers, lack of awareness
3. Theresa M. talks about what living with Alzheimer’s feels like for her.
   a. What surprised you about the person in this video?
   b. What biases about people with Alzheimer’s or other dementias may be challenged by those in this video?
   c. What can we learn from people with Alzheimer’s or other dementias?
   d. This video centers people with Alzheimer’s and other dementias. Why is that important when working to advance health equity among people with Alzheimer’s and other dementias?
   e. What are ways this video could be improved to better represent health equity in Alzheimer’s and other dementias?

4. The River: A Native Story About Dementia
   a. How is the narrative about dementia in this video similar or different to other narratives you have heard?
   b. In thinking about communication products for health equity and dementia, what makes this an exemplary product?
These are the graphics used in the module. They can be used as a basis for discussion or activities in your learning environment. Possible answers are shown where appropriate in italics, but answers are not exhaustive or comprehensive.

### Questions:

1. What is surprising to you about this graph?
2. What are some possible factors contributing to the increase in projected numbers of people living with Alzheimer’s and other dementias?
   - Increasing life expectancy, increasing risk factors
3. Why is this graphic important for public health professionals addressing Alzheimer’s disease and other dementias?
   - Need for increased education and awareness for public on risk reduction; need for planning on how to meet the needs of people, communities and infrastructure given the rapidly increasing numbers impacted by Alzheimer’s and other dementias

**Figure 5**

Projected Number of People Age 65 and Older (Total and by Age) in the U.S. Population with Alzheimer’s Dementia, 2020 to 2060

<table>
<thead>
<tr>
<th>Millions of people</th>
<th>Ages 65-74</th>
<th>Ages 75-84</th>
<th>Ages 85+</th>
</tr>
</thead>
<tbody>
<tr>
<td>2020</td>
<td>6.1</td>
<td>5.4</td>
<td>2.7</td>
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<td>8.5</td>
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</tr>
<tr>
<td>2060</td>
<td>13.8</td>
<td>11.8</td>
<td>6.9</td>
</tr>
</tbody>
</table>

Created from data from Rajan et al.66,222
Graph from 2023 Alzheimer’s Disease Facts and Figures (page 30)
Questions:

1. What is surprising to you about this graph?

2. What are some possible factors contributing to differences in percentage changes in the selected causes of death in this time frame?
   a. Increasing life expectancy (some of which is due to improved treatments and access to care for other health conditions identified here); the existence of treatment for other causes of deaths (for example, there are treatments for cancer, heart disease and HIV, while there were no treatments for Alzheimer’s disease in this time frame); length and quantity of investment put into other diseases and conditions (cancer has received significant funding and attention for more time than Alzheimer’s disease)

3. Why is this graphic important for public health professionals addressing Alzheimer’s disease and other dementias?
   a. Helps illustrate the need for more focus on addressing Alzheimer’s disease risk, diagnosis and treatment options; offers hope showing the successes in other diseases that can continue to motivate work in Alzheimer’s disease
Questions:

1. What is surprising to you about this graph?

2. Summarize the meaning of this graphic in a few sentences.
   a. Health equality and health equity are not the same. In the top panel, everyone is provided with the same bicycle — in that sense, everyone is equal. But, the bicycle is too big for some, too small for others and not usable at all for the person in a wheel chair. To achieve equity, each person needs the necessary and appropriate tools, opportunities and knowledge to achieve the highest level of health. In the figure, this means ensuring that the bicycle each person has is appropriate for their circumstances like in the bottom panel — so that everyone can ride a bicycle, not just that everyone has a bicycle.

3. Why is this graphic important for public health professionals addressing Alzheimer’s disease and other dementias?
   a. Why is this graphic important for public health professionals addressing Alzheimer’s disease and other dementias?
Characteristics that May Impact Health Equity

**Activity 1:** In groups, brainstorm what as many characteristics as you can think of that may impact Healthy Equity in Alzheimer’s and other dementias. As a class, go through the groups and share out brainstorm ideas. Record the ideas on the class whiteboard. Compare to those shown in the Health Equity module.

**Activity 2:** Using the graphic organizer below, provide one (or more) answers from the Word Bank for a way that specific characteristic may impact health equity. Some impacts may be used for more than one characteristic. (Note: this can also be done interactively as a class by using the flip cards in the module to name characteristic with their associated image and then discussing ways that specific characteristic may impact health equity in Alzheimer’s and other dementias.)

### Word Bank

<table>
<thead>
<tr>
<th>Early Diagnosis</th>
<th>Access to health care</th>
<th>Culturally appropriate care</th>
</tr>
</thead>
<tbody>
<tr>
<td>Amount of time spent caregiving</td>
<td>Discrimination in health care setting</td>
<td>Economic opportunities</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Image</th>
<th>Characteristic</th>
<th>Impact(s) on Health Equity</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image1.png" alt="Image" /></td>
<td>Age</td>
<td><em>Early diagnosis</em></td>
</tr>
<tr>
<td><img src="image2.png" alt="Image" /></td>
<td>Caregiving status</td>
<td><em>Economic opportunities</em></td>
</tr>
<tr>
<td><img src="image3.png" alt="Image" /></td>
<td>Citizens of Sovereign Tribal Nations</td>
<td><em>Access to health care</em></td>
</tr>
<tr>
<td>Image</td>
<td>Characteristic</td>
<td>Impact(s) on Health Equity</td>
</tr>
<tr>
<td>-------</td>
<td>--------------------------------------------</td>
<td>------------------------------------------------</td>
</tr>
<tr>
<td><img src="image1" alt="Image" /></td>
<td>Cognitive, Sensory, Intellectual or Physical Disability</td>
<td>Early diagnosis</td>
</tr>
<tr>
<td><img src="image2" alt="Image" /></td>
<td>Gender</td>
<td>Amount of time spent caregiving</td>
</tr>
<tr>
<td><img src="image3" alt="Image" /></td>
<td>Geographic location</td>
<td>Access to health care</td>
</tr>
<tr>
<td><img src="image4" alt="Image" /></td>
<td>Immigration or Refugee Status</td>
<td>Access to health care</td>
</tr>
<tr>
<td><img src="image5" alt="Image" /></td>
<td>Mental Health</td>
<td>Early diagnosis</td>
</tr>
<tr>
<td><img src="image6" alt="Image" /></td>
<td>Race or Ethnicity</td>
<td>Discrimination in health care settings</td>
</tr>
<tr>
<td>Image</td>
<td>Characteristic</td>
<td>Impact(s) on Health Equity</td>
</tr>
<tr>
<td>-------</td>
<td>--------------------------------------------</td>
<td>------------------------------------------------</td>
</tr>
<tr>
<td><img src="image1.png" alt="Image" /></td>
<td>Religion</td>
<td>Culturally appropriate health care</td>
</tr>
<tr>
<td><img src="image2.png" alt="Image" /></td>
<td>Sexual Orientation or Gender Identity</td>
<td>Discrimination in health care settings</td>
</tr>
<tr>
<td><img src="image3.png" alt="Image" /></td>
<td>Socioeconomic Status</td>
<td>Access to health care</td>
</tr>
</tbody>
</table>
Questions:
For each of the 5 domains of social determinants of health, what are ways they impact health equity in Alzheimer’s and other dementias?

1. Health care access and quality
   a. Access to early diagnosis, management of other chronic health conditions, risk reduction interventions and education

2. Neighborhood and built environment
   a. Risk reduction measures such as physical activity, freedom from discrimination, safety

3. Social and community context
   a. Social, emotional, financial and practical support for people with dementia and their caregivers

4. Economic stability
   a. Lifelong risk reduction, such as access to healthy foods, healthcare and safe housing; support and long-term planning for people with dementia and caregivers

5. Education access and quality
   a. Those with higher levels of formal education tend to live longer and have a healthier life, reducing risk for developing Alzheimer’s and other dementias
Questions:

For each of the 5 domains of social determinants of health, what are ways they impact health equity in Alzheimer’s and other dementias?

1. What is surprising to you about this graphic?

2. Summarize the meaning of this graphic in a few sentences.
   
   a. The graphic shows some of the risk factors with the strongest evidence for their link to cognitive decline and dementias that are modifiable and non-modifiable – meaning an individual person may have the ability to change the risk factor (modifiable) or they cannot (non-modifiable.)

   Economic stability

3. How do these risk factors relate to social determinants of health and health equity in Alzheimer’s and other dementias?

   a. The ability to address the individual risk factors varies based on the population’s social determinants of health. This variance leads to inequities, and these inequities may prevent people from being able to easily modify these risk factors or exposure to them. It is through this process that risk factors are social, cultural and structural barriers, including structural racism, ageism and classism. They create and compound health inequities by hindering the ability to address the risk for dementia in some communities. If done well, the structural barriers themselves are modified by challenging racist, ageist, sexist, and classist policies and practice and by making better health easier to achieve for all.
Question:
For each of the life stages shown, identify at least one-way public health population actions can impact dementia risk reduction.
1. Before a child is born: Enable access for pregnant people to consistent, reliable and affordable prenatal care to support the child’s brain health and development.
2. Toddler: Improve the child’s access to healthy food and expand access to early childhood education.
3. Youth: Continue to build and reinforce healthy habits around nutrition and physical activity. Support seatbelt and helmet use to protect against traumatic brain injury and encourage proper athletic supervision to reduce injuries from contact sports such as football or field hockey.
4. Early adulthood: Implement smoking cessation campaigns through public education and awareness campaigns.
5. Mid-life: Protect cardiovascular health through programs to prevent and manage hypertension and diabetes, reduce obesity, and improve access to health care providers.
6. Older life: Enhance the environment to reduce risk of falls, promote care plans to manage medications, and help access caregiver supports and services.
Question:
For each level of influence in the Social Ecological Model, provide at least one-way public health can help support health equity in Alzheimer’s and other dementias.

1. Public Policy: National policy initiatives can intentionally focus health equity in their funding recipients. (Example: Healthy Brain Initiative Component B Recipients)

2. Community: Health departments can partner with other organizations to ensure messaging is culturally appropriate. (Example: Washington Department of Health partnered with the nonprofit Center for MultiCultural Health to tailor and disseminate brain health messages to Black audiences)

3. Organizational: Health departments can offer internal trainings on Alzheimer’s and other dementias to equip staff in understanding the intersections of social determinants of health, health inequities, and risk factors for Alzheimer’s and other dementias.

4. Interpersonal: Health departments can support community-based work to strengthen social networks for people from disproportionately impacted communities who are living with dementia and their caregivers. (Example: Oregon’s SHARP program in historically Black neighborhoods)

5. Individual: Health departments can support and promote local resources for caregivers and people living with dementia, especially in communities with less access to resources. (Example: support groups, care consultations, educational classes, etc.)
Learn more about policies that support caregivers, such as the RAISE Family Caregivers Act, the Caregiver Advise Record and Enable (CARE) Act, the Older Americans Act, and paid family leave laws.

Resources from the Alzheimer’s Association:

- **Alzheimer’s Association Inclusive Language Guide**
  - Guidance for describing social identities and characteristics of individuals and populations and communicating about health disparities.

- **Alzheimer’s Association National Partnership**
  - By partnering with organizations locally and nationally to advance diversity and inclusion, the Association works to broaden its reach in all communities.

- **Alzheimer’s Association A Public Health Site**
  - Find data, tools, resources, expert guidance, and examples of action to help you address Alzheimer’s and other dementias in your state and community.

- **Healthy Brain Initiative Road Map for Indian Country**
  - This guide helps American Indian and Alaska Native leaders address dementia in their communities.

- **Healthy Brain Initiative State and Local Public Health Road Map**
  - This guidebook leads state and local public health agencies through 24 actions to act quickly and strategically to stimulate positive changes in policies, systems, and environments.

- **Race, Ethnicity, and Alzheimer’s in America Special Report**
  - Key findings presented on health disparities and health care disparities in Alzheimer’s and other dementia.

Resources from the Centers for Disease Control and Prevention (CDC):

- **BOLD Infrastructure for Alzheimer’s Act**
  - Awards and recipients of the BOLD Public Health Programs to Address Alzheimer’s Disease and Related Dementias notice of funding opportunity.

- **Healthy Brain Resource Center**
  - An easy-to-navigate website that helps users find credible public information and materials to support implementing the Healthy Brain Initiative (HBI) Road Map actions.

- **Health Equity in Action Case Studies**
  - Health Equity in Action uses best practices to spotlight projects that demonstrate commitment and shares the lived experiences of communities advancing health equity.
Additional Resources

- A Practical Guide: Communicating Brain Health Messages with Latino and African American Communities
- Dementia Friends for American Indian and Alaskan Native Communities
- Diverse Elders Training: Caring for Those Who Care
- Health Equity Initiative
- National Task Group on Intellectual Disabilities and Dementia Practices
- Public Health Learning Network Webinars
- Racism as a Public Health Crisis – Perspective on Healthy Aging
- Reframing Aging: A Gaining Momentum Toolkit
- SAGECare Trainings for Culturally Competent Care for LGBTQ+ Older Adults
- Title 6 Serving Tribal Elders Across the United States
1. Alzheimer’s and other dementias are a growing public health priority because
   A. Current projections are that 13.9 million people aged 65 years and older will be living with dementia in 2060.
   B. Between 2000 and 2019, the number of Alzheimer’s deaths increased at the same rate as other major diseases, including heart disease, stroke and HIV.
   C. Annual costs related to Alzheimer’s are projected to increase to just under $1 trillion in 2050.
   D. A & C
   E. All of the above.

2. Health equity is
   A. The attainment of the highest level of health for all people.
   B. Providing the same opportunities to all people.
   C. Acknowledging the underlying causes of health disparities and motivating action through the belief that those systems can be changed.
   D. A & C
   E. All of the above

3. Health inequities
   A. Adversely affect groups of people who have systematically experienced greater obstacles to health based on certain characteristics.
   B. Cannot be changed.
   C. Only impact a few groups of people that should be prioritized for making impact.
   D. A & B
   E. All of the above

4. Social determinants of health
   A. Are unrelated to health equity in Alzheimer’s and other dementias.
   B. Are limited to the physical environment, including housing, access to healthy food and safe neighborhoods.
   C. Make up the environment in which people are born, live, learn, work, play, worship and age.
   D. A & C
   E. All of the above

5. Social determinants of health that may increase risk of developing Alzheimer’s and other dementias include
   A. Not having access to healthy food or safe, affordable housing.
   B. Not having access to healthcare coverage.
   C. Having strong relationships with friends, family and coworkers.
   D. A & B
   E. All of the above
7. Intersectionality in health equity
   A. Does not require professionals to consider all dimensions of people and their communities.
   B. Is an approach or lens that recognizes that health is shaped by a multi-dimensional overlapping of factors.
   C. Acknowledges that someone who identifies as a Black female caregiver may experience different health inequities than someone who identifies as a Black male caregiver or an Asian American female caregiver.
   D. B & C
   E. All of the above

8. Public health professionals can engage with health equity in Alzheimer’s and other dementias by
   A. Moving funding from Women Infant Children programs to Aging Services.
   B. Recognizing that cardiovascular health and brain health are unrelated topics.
   C. Supporting seatbelt and helmet use and quit smoking campaigns.
   D. A & B
   E. All of the above

9. Use the words from the word bank to fill in the statements below regarding levels of influence in the Social Ecological Model.

   WORD BANK:
   Public Policy • Interpersonal • Community • Individual • Organizational
   A. National, state, local laws and regulations fall in the realm of ________________.
   B. Relationships between organizations help make up a ________________.
   C. Organizations and social institutions interact at the ________________ level.
   D. Families, friends and social networks form ________________ relationships.
   E. Knowledge, attitudes and skills are held by the ________________.
10. True or False: Utilizing strategies that act across multiple levels of the social ecological model at the same time is unlikely to achieve long-term population-level impact.

11. True or False: When creating partnerships, partners can come from a variety of sectors, including government, education, business, public services, faith communities and funders.

12. True or False: When soliciting feedback, it is important to prioritize having representation from diverse groups of those living with dementia and caregivers.

13. True or False: Culturally responsive information should be in the language most spoken by your constituents, avoid stereotypes and be in accessible formats for people with disabilities.

14. What are possible next steps to take to learn more or get involved in health equity in Alzheimer’s and other dementias?
   A. Sign up for CDC’s Alzheimer’s Disease and Healthy Aging newsletter.
   B. Consider volunteering with community partners in your area.
   C. Evaluate diversity, equity and inclusion internally in your organization and make changes accordingly.
   D. Explore caregiver and cognitive decline data in your state, learn about public health actions and initiatives and share what you learn with others.
   E. All of the above.