Standardized Dental Screening for New Nursing Home Residents:

A Promising Practice Guide

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Introduction

During 2015-16, the Center for Rural Health (CRH) completed work under a subcontract with the North Dakota Department of Health (ND DoH), Oral Health Program. Funded by DentaQuest, the work focused on identifying the current oral health programs and policies among nursing homes in North Dakota. Working in partnership with the North Dakota Long Term Care (LTC) Association, the CRH surveyed LTC administrators/unit charge nurses and found:

- One in two LTC facilities had a written plan of care for dental needs, but only 13% of those with plans had their policies reviewed by dental professionals.
- While required by law, 28% of facilities self-reported that they did not conduct dental assessments upon admission of new residents.
- When there was a dental assessment upon admission, 90% were completed by someone outside of the dental field, primarily completed by the nursing home's unit charge nurse (42%) or other registered nurse (15%).

Recognizing the need, and the lack of national standards on the topic, the CRH was funded during 2017-18 to work with State and national partners to develop a promising practice for screening residents' dental needs upon admission to nursing homes. This guide provides a national template for nursing home administrators and dental professionals in an effort to ensure that all nursing home residents, upon admission, have dental screenings completed by dental professionals. This initial dental screen should inform a resident's daily plan of care for oral hygiene. This new resident dental screening tool was developed utilizing international research on existing assessments and through review of federal regulations, state requirements, and both private and public insurance coverage of dental services for nursing home residents. The North Dakota Older Adult Oral Health Work Group also identified this as a 2017-18 priority, providing significant feedback.

North Dakota Older Adult Oral Health Work Group

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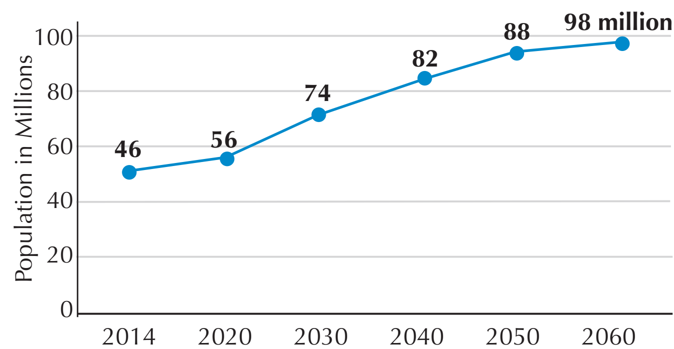
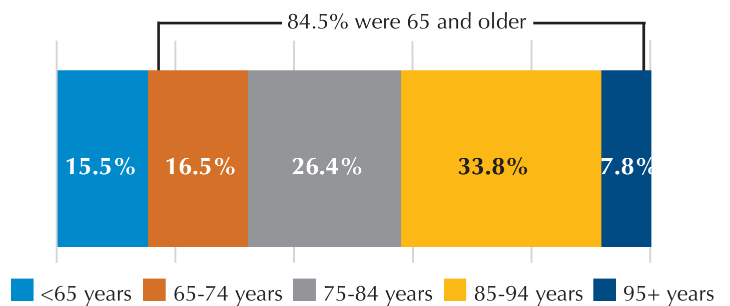
Snapshot: U.S. Nursing Home Care

Total Number of Residents in Certified Nursing Facilities in 2015: 1,351,616[b]

620–11,542 | 11,863–27,848 | 27,862–40,403 | 40,887–104,536



Roughly 49.2 million people in the U.S. are 65 years of age and older, just over 15% of the total U.S. population[c]

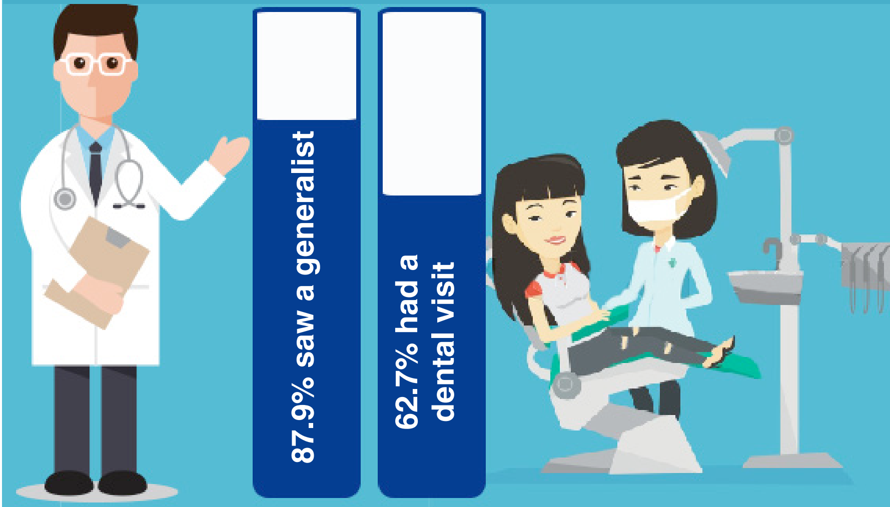


In 2014, 84.5% of nursing home residents were 65 years of age and older[a]

More than three out of every five nursing home residents (63.1%) report between four and five impaired daily living activities[a]

A Snapshot: Oral Healthcare for People Ages 65 and Older

People 65 years of age and older were more likely to have visited a general physician in the past year than to have visited a dentist[d]

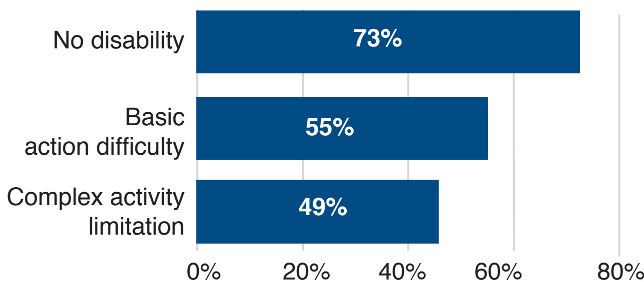


In 2015, fewer people ages 65 and older visited a dentist in the past year than those who were ages 2-17[d]

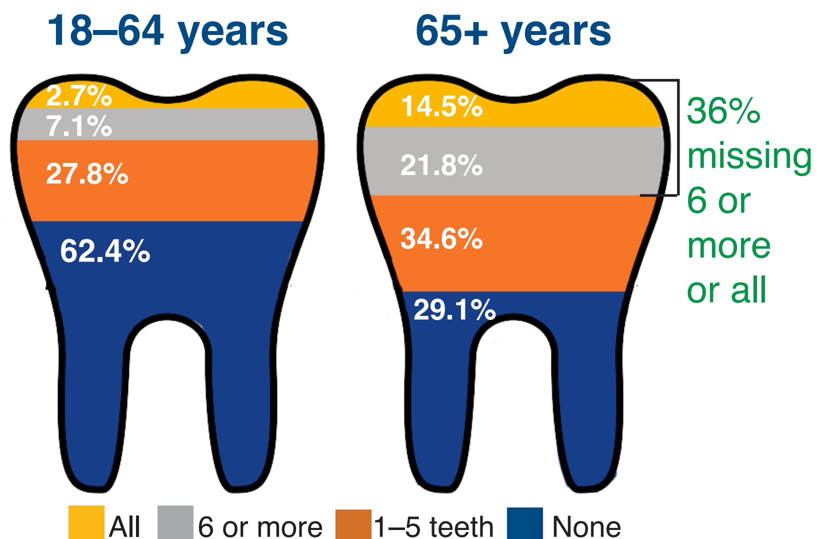
84.7% of people ages 2–17 had a dental visit

64% of people ages 18–64 had a dental visit

62.7% of people ages 65 or older had a dental visit

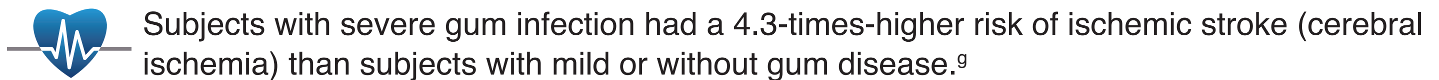


A greater percentage of people 65 years of age and older with no physical disability saw a dentist in the past year (73%) than those with basic or complex physical limitations[d]



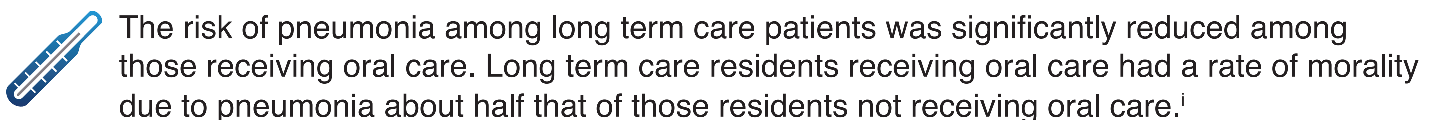
Oral Health Has a Direct Impact on Nursing Home Residents' Overall Health

Poor oral hygiene impacts more than the mouth. Though there is not necessarily direct causality, evidence suggests that poor oral health and gum disease are linked with increased hospitalizations, readmissions, respiratory infections, diabetes, dementia, poor nutrition, pneumonia, chronic obstructive pulmonary disease, and behavioral change in the elderly.

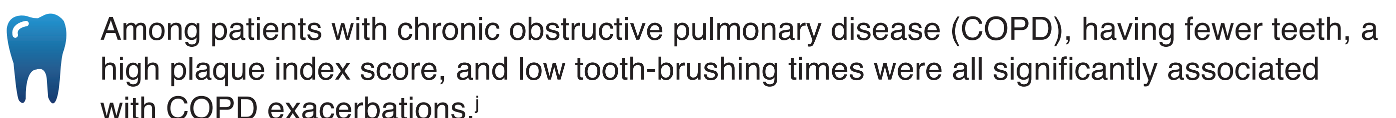


Subjects with severe gum infection had a 4.3-times-higher risk of ischemic stroke (cerebral ischemia) than subjects with mild or without gum disease.[g]

People who had chronic gum inflammation for 10 or more years were 70% more likely than people without gum inflammation to develop Alzheimer's disease.[h]



The risk of pneumonia among long term care patients was significantly reduced among those receiving oral care. Long term care residents receiving oral care had a rate of morality due to pneumonia about half that of those residents not receiving oral care.[i]



Among patients with chronic obstructive pulmonary disease (COPD), having fewer teeth, a high plaque index score, and low tooth-brushing times were all significantly associated with COPD exacerbations.[j]

Dental Care Reimbursement for Nursing Home Residents

Medicare

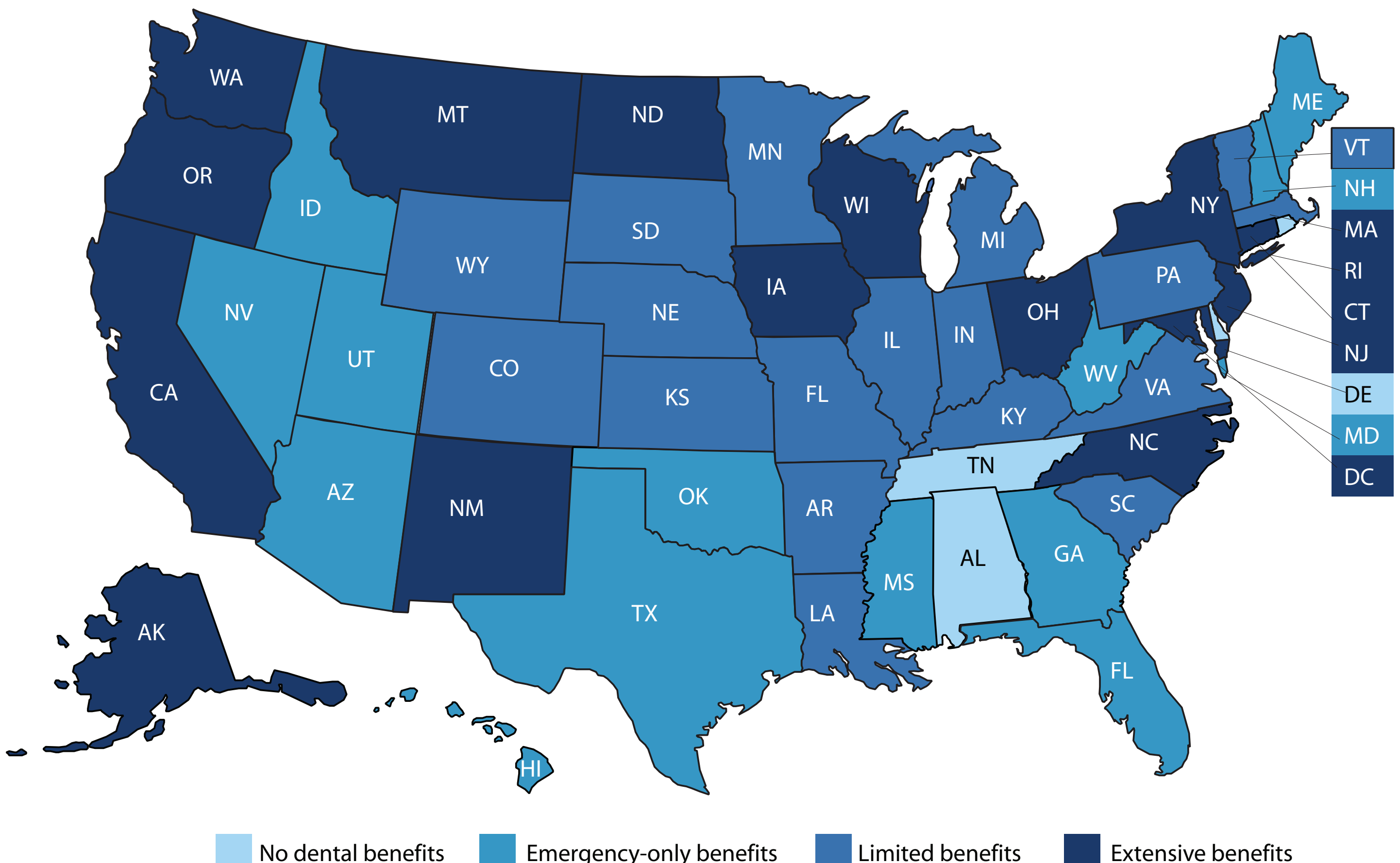
Medicare is the federal health insurance program for people who are 65 years of age and older, certain younger people with disabilities, and people with end-stage renal disease. Medicare coverage is administered by the federal government, and services covered are standardized across all states. Medicare Part A covers inpatient hospital stays, nursing home care, hospice, and some home health services; Part B covers doctors' services, outpatient care, medical supplies, and preventive services. Most individuals ages 65+ have both Parts A and B.

Medicare Parts A and B do not cover dental care, dental procedures, cleanings, fillings, tooth extractions, dentures, dental plates, nor other dental devices.[k]

Medicaid

Medicaid provides health coverage for low-income people, children, pregnant women, elderly, and people with disabilities. Medicaid is administered by states and is funded jointly by state and federal governments.[l] As such, dental and nursing facility services covered by Medicaid vary significantly by state. Federal Medicaid requirements for nursing facilities specify that the facility must provide emergency dental services at no charge to residents. However, routine dental services are only covered as directed under each state's plan.[m] Less than half of the states currently provide comprehensive dental care for adults enrolled in Medicaid.[n] Only 17 states provide extensive dental benefits for their base Medicaid populations. These benefits include "a comprehensive mix of services, including more than 100 diagnostic, preventive, and minor and major restorative procedures approved by the ADA [American Dental Association]; per-person annual expenditure cap is at least $1,000."[o] Contact your state's Department of Human Services, or visit its website, for a list of specific adult dental services covered under Medicaid.

Medicaid Coverage of Adult Dental Benefits, February 2016



Code of Federal Regulations

The Code of Federal Regulations (CFR) is the codification of the general and permanent rules and regulations (sometimes called administrative law) published in the Federal Register by the executive departments and agencies of the federal government of the United States.[p] The CFR requires all nursing home facilities to conduct an oral health assessment upon admission of a new resident and periodically (42 CFR § 483.20). However, federal law does not specify which provider type is responsible for conducting the dental assessment.

Federal law also requires that nursing homes:

- Obtain routine and emergency dental services from an outside resource to meet resident needs;
- Assist residents with making dental appointments and arranging transportation, as requested;
- Refer patients with lost or damaged dentures within three days; and
- Assist residents in applying for dental service reimbursement.

Under CFR § 483.20 Resident assessment, section (b) Comprehensive assessment, nursing homes must make a comprehensive assessment of a resident's needs, strengths, goals, life history, and preferences using the Resident Assessment Instrument (RAI) specified by the Centers for Medicare & Medicaid Services (CMS).

See Appendix A for specific federal language as it applies to CFR § 483.20.

CMS's Resident Assessment Instrument

CMS Minimum Data Set (MDS) Resident Assessment Instrument (RAI) 3.0 provides clear measures and tracking for nursing home resident health.[q] The RAI is the standardized assessment tool utilized for each resident upon admission, quarterly, annually, and/or at a significant change in health status. Effective October, 2017, Section L of the MDS 3.0 RAI intended for nursing homes to record the following dental problems present in a seven-day look-back period (L0200: Dental):

L0200. Dental	
↓ **Check all that apply**	
☐	**A. Broken or loosely fitting full or partial denture** (chipped, cracked, uncleanable, or loose)
☐	**B. No natural teeth or tooth fragment(s)** (edentulous)
☐	**C. Abnormal mouth tissue** (ulcers, masses, oral lesions, including under denture or partial if one is worn)
☐	**D. Obvious or likely cavity or broken natural teeth**
☐	**E. Inflamed or bleeding gums or loose natural teeth**
☐	**F. Mouth or facial pain, discomfort or difficulty with chewing**
☐	**G. Unable to examine**
☐	**Z. None of the above were present**

For more information on MDS 3.0 RAI, access the Long-Term Care Facility Resident Assessment Instrument 3.0 User's Manual at downloads.cms.gov/files/MDS-30-RAI-Manual-v115-October-2017.pdf. Review Appendix B for Section L: Oral/Dental Status as presented in the CMS MDS 3.0 RAI.

Development of a Standardized Dental Screening for Nursing Home Residents

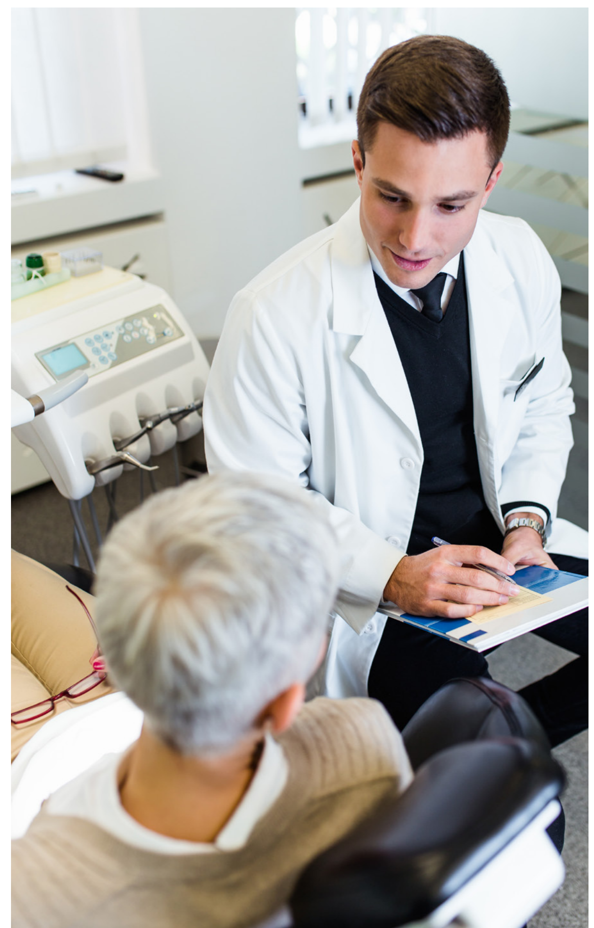
In its manual for the RAI, CMS specifically states that "Interdisciplinary use of the RAI promotes this emphasis on quality of care and quality of life. Nursing homes have found that involving [multiple] disciplines . . . in the RAI process has fostered a more holistic approach to resident care and strengthened team communication. This interdisciplinary process also helps to support the spheres of influence on the resident's experience of care, including: workplace practices, the nursing home's cultural and physical environment, staff satisfaction, clinical and care practice delivery, shared leadership, family and community relationships, and federal/state/local government regulations."[q]

The CRH worked with state and national partners to develop a standardized dental screening tool to use for all new nursing home residents at the time of their admittance. This tool was developed in collaboration with the North Dakota Older Adult Oral Health Work Group, the North Dakota Long Term Care Association, the DentaQuest Foundation, the North Dakota Department of Human Services, and the North Dakota Dental Association (among others).

Measures included in the proposed dental screening were derived from the Code of Federal Regulations,[p] section L of CMS's Minimum Data Set Resident Assessment Instrument 3.0,[q] the Basic Screening Survey for Older Adults recommended by the Association of State and Territorial Dental Directors,[r] and national/international case studies.[s-v] The screening was presented to a focus group consisting of rural and urban nursing home direct care providers, nursing home administrators, and dental providers (dentists and dental hygienists) from various dental clinic settings. The group included federally qualified health centers, individual private practices, and mobile units.

Promising Practice

It is recommended that all new nursing home residents have a dental screen completed by a dental provider and a direct care provider at the nursing home within 14 days of admission. A dental professional may be any member of the dental team, depending on each state's licensure laws and provider scopes of practice.



The Dental Provider Is Responsible for:

- Assessing a resident's dental status;
- Identifying all dental problems; and
- Making recommendations for a resident's daily oral care plan.

The Nursing Home Direct Care Provider Is Responsible for:

- Identifying a resident's dental home and emergency dental contact;
- Ensuring the comprehensive dental assessment is completed;
- Identifying cognitive problems that may limit a resident's ability to perform oral hygiene;
- Listing any functional impairments that may limit a resident's ability to perform oral hygiene;
- Indicating if the resident is on any medication that may cause dry mouth;
- Indicating if the resident has been diagnosed with any condition that is related to poor oral hygiene or oral infection; and
- Developing the resident's daily oral care plan and personal oral health toolkit.

Comprehensive Dental Screening Tool for New Nursing Home Residents

RESPONSIBILITY OF A DENTAL PROVIDER

Provider Name: ______________________________ **Date:** ____________

Dental visit type: ☐ Admission ☐ Annual ☐ Other (reason): ____________

DENTAL STATUS

Number of functional teeth: ____________

Maxillary denture present	☐ Yes	☐ No
Mandibular denture present	☐ Yes	☐ No
Substantial oral debris, food impaction	☐ Yes	☐ No
Edentulous [L0200B]	☐ Yes	☐ No
Root fragments	☐ Yes	☐ No
Severe gingival inflammation	☐ Yes	☐ No
Calculus buildup	☐ Yes	☐ No

MARK ALL THAT APPLY [CMS's Resident Assessment Instrument (RAI) 3.0]

	CMS Code
☐ Unable to examine	L0200G
☐ Broken or loosely fitting full or partial denture (chipped, cracked, uncleanable, loose)	L0200A
☐ Abnormal mouth tissues (ulcers, masses, oral lesions, including under denture or partial)	L0200C
☐ Obvious or likely cavity or broken natural teeth (untreated decay)	L0200D
☐ Inflamed or bleeding gums or loose natural teeth	L0200E
☐ Mouth or facial pain, discomfort, or difficulty with chewing	L0200F
☐ None of the above were present	L0200Z
☐ Dental Care Area Assessment triggered (presence of L0200A-F)	

TREATMENT NEEDED

- ☐ No obvious problem (set next regular check within 6 months)
- ☐ Dental care needed (buildup or decay without swelling or pain)
- ☐ Urgent care (pain, infection, large decay, abscess or drainage)

Other treatment notes: ____________

____

DAILY ORAL CARE PLAN RECOMMENDATIONS

- ☐ Prevident
- ☐ Chlorhexidine Mouthwash

Denture cleaning, assistance level:

☐ Independent ☐ Some assistance ☐ Fully dependent

Teeth cleaning, assistance level:

☐ Independent ☐ Some assistance ☐ Fully dependent

Other daily care notes: ____________

____

Dental provider signature: ______________________________ **Date:** ____________

RESPONSIBILITY OF A UNIT CHARGE NURSE

Name of resident's dentist/dental home:______________________________ Phone Number:__________

Date of last dental exam: __________ 24/hour dental emergency contact, if available: ____________________

Dental intake screening completed ☐ Yes ☐ No Next appointment, if treatment needed:__________

Referral made: ☐ Yes ☐ No Provider: ____________________

Annual dental exam scheduled: ☐ Yes ☐ No Date:____________________

COGNITIVE PROBLEMS: Cognitive problem(s) limiting ability to perform personal dental hygiene

- ☐ Needs Reminders to clean teeth/dentures
- ☐ Cannot remember steps to complete oral hygiene
- ☐ Decreased ability to understand others or to perform tasks following demonstration

FUNCTIONAL IMPAIRMENT: Functional impairment(s) limiting ability to perform personal dental hygiene

- ☐ Impaired hand dexterity
- ☐ Loss of voluntary arm movement
- ☐ Decreased mobility
- ☐ Resists assistance with activities of daily living
- ☐ Limitation in upper extremity range of motion
- ☐ Requires adaptive equipment for oral hygiene

DRY MOUTH: Causing buildup of oral bacteria ☐ Yes ☐ No

Medications (from MDS and medication administration record):

- ☐ Antipsychotics
- ☐ Antidepressants
- ☐ Antianxiety agents
- ☐ Diuretics
- ☐ Hypnotics
- ☐ Sedatives
- ☐ Antihypertensives
- ☐ Decongestants
- ☐ Antiemetics
- ☐ Narcotics
- ☐ Antineoplastics
- ☐ Antihistamines
- ☐ Anticonvulsants

DISEASES AND CONDITIONS: That which may be related to poor oral hygiene, oral infection

- ☐ Unstable diabetes related to oral infection
- ☐ Endocarditis related to oral infection
- ☐ Poor nutrition
- ☐ Sores in mouth related to poor-fitting dentures
- ☐ Recurrent pneumonia related to aspiration of saliva contaminated due to poor oral hygiene

Daily Oral Care Plan Developed ☐ Yes ☐ No

Oral Health Toolkit Prepared ☐ Yes ☐ No

Supplies required in oral health toolkit are determined by the initial oral health screen, and may include:

- ☐ Toothbrush
- ☐ Kidney dish
- ☐ Floss handle
- ☐ Floss
- ☐ Toothettes
- ☐ Denture cleaner
- ☐ Toothpaste
- ☐ Facecloth
- ☐ Mouth prop
- ☐ Denture cup
- ☐ Proxabrush
- ☐ Denture brush
- ☐ Prevident
- ☐ Chlorhexidine Mouthwash
- ☐ Daily oral care plan

Other notes:____

____

Unit charge nurse signature: ______________________________ Date:__________

Daily Oral Care Plan

Nursing facilities are responsible for creating daily care plans for each resident. The daily oral care plan is developed in response to the original oral health screening completed upon admission. Recognizing a resident's cognitive and functional impairments that may impact his/her ability to perform personal dental hygiene must be considered by the team developing the daily care plan. A complete daily oral care plan will:

- Indicate the resident's ability to assist in his/her own dental hygiene;
- List all supplies included in the individual's oral health toolkit;
- Track frequency of dental care needed and provided (e.g., number of times brushing per day); and
- Provide a place for direct care providers to note any observed dental concerns.

Oral Health Toolkit

Each resident should be supplied an oral health toolkit containing supplies needed in order to maintain good oral hygiene. Supplies required in a resident's oral health toolkit are determined by the initial oral health screen and may include:[S,V]

- Toothbrush
- Kidney dish
- Floss handle
- Floss
- Toothettes
- Denture cleaner
- Toothpaste
- Facecloth
- Mouth prop
- Denture cup
- Proxabrush
- Denture brush
- Prevident
- Chlorhexidine Mouthwash
- Daily oral care plan

For more information on daily oral care plans, or to review comprehensive care plan templates developed by other entities, read Oral Health Care Management: Recommendations for Long-Term Care Facilities at www.dhss.delaware.gov/dph/hsm/files/oralhealthcaremanagementreport.pdf.

Appendix A: US Law § 483.20 Resident Assessment [Excerpt]

The facility must conduct initially and periodically a comprehensive, accurate, standardized, reproducible assessment of each resident's functional capacity.

(a) Admission orders.

(b) Comprehensive Assessments –

(1) Resident Assessment Instrument (RAI). A facility must make a comprehensive assessment of a resident's needs, strengths, goals, life history and preferences, using the RAI specified by the Centers for Medicaid & Medicare (CMS). The assessment must include at least the following:

(i) Identification and demographic information . . . [ii-x omitted]

(xi) Dental and nutritional status . . . [x-xvi omitted]

(xvii) Documentation of summary information regarding the additional assessment performed on the care areas triggered by the completion of the Minimum Data Set.

(xviii) Documentation of participation in assessment. The assessment process must include direct observation and communication with the resident, as well as communication with licensed and non-licensed direct care staff members on all shifts.

Nursing facilities. The facility

(1) Must provide or obtain from an outside resource, in accordance with § 483.70(g), the following dental services to meet the needs of each resident:

(i) Routine dental services (to the extent covered under the State plan); and

(ii) Emergency dental services;

(2) Must, if necessary or if requested, assist the resident -

(i) In making appointments; and

(ii) By arranging for transportation to and from the dental services locations;

(3) Must promptly, within 3 days, refer residents with lost or damaged dentures for dental services. If a referral does not occur within 3 days, the facility must provide documentation of what they did to ensure the resident could still eat and drink adequately while awaiting dental services and the extenuating circumstances that led to the delay;

(4) Must have a policy identifying those circumstances when the loss or damage of dentures is the facility's responsibility and may not charge a resident for the loss or damage of dentures determined in accordance with facility policy to be the facility's responsibility; and

(5) Must assist residents who are eligible and wish to participate to apply for reimbursement of dental services as an incurred medical expense under the state plan.

Appendix B: The Centers for Medicare & Medicaid Services' (CMS) Minimum Data Set (MDS) Resident Assessment Instrument (RAI) 3.0: Section L

This information is copied directly from CMS' Long-Term Care Facility Resident Assessment Instrument 3.0 User's Manual, Version 1.15, pages 415-17 available at https://downloads.cms.gov/files/MDS-30-RAI-Manual-v115-October-2017.pdf.

SECTION L: ORAL/DENTAL STATUS

Intent: This item is intended to record any dental problems present in the 7-day look-back period.

L0200: Dental [check all that apply]

- ☐ A. Broken or loosely fitting full or partial denture (chipped, cracked, uncleanable, or loose)
- ☐ B. No natural teeth or tooth fragment(s) (edentulous)
- ☐ C. Abnormal mouth tissues (ulcers, masses, oral lesions, including under denture or partial if one is worn)
- ☐ D. Obvious or likely cavity or broken natural teeth
- ☐ E. Inflamed or bleeding gums or loose natural teeth
- ☐ F. Mouth or facial pain, discomfort or difficulty with chewing
- ☐ G. Unable to examine
- ☐ Z. None of the above were present

Item Rationale

Health-related Quality of Life

- Poor oral health has a negative impact on
    - o Quality of life
    - o Overall health
    - o Nutritional status
- Assessment can identify periodontal disease that can contribute to or cause systemic diseases and conditions, such as aspiration, malnutrition, pneumonia, endocarditis, and poor control of diabetes.
- Planning for Care
- Assessing dental status can help identify residents who may be at risk for aspiration, malnutrition, pneumonia, endocarditis, and poor control of diabetes.

Steps for Assessment

1. Ask the resident about the presence of chewing problems or mouth or facial pain/discomfort.
2. Ask the resident, family, or significant other whether the resident has or recently had dentures or partials. (If resident or family/significant other reports that the resident recently had dentures or partials, but they do not have them at the facility, ask for a reason.)
3. If the resident has dentures or partials, examine for loose fit. Ask him or her to remove, and examine for chips, cracks, and cleanliness. Removal of dentures and/or partials is necessary for adequate assessment.
4. Conduct exam of the resident's lips and oral cavity with dentures or partials removed, if applicable. Use a light source that is adequate to visualize the back of the mouth. Visually observe and feel all oral surfaces including lips, gums, tongue, palate, mouth floor, and cheek lining. Check for abnormal mouth tissue, abnormal teeth, or inflamed or bleeding gums. The assessor should use his or her gloved fingers to adequately feel for masses or loose teeth.

5. If the resident is unable to self-report, then observe him or her while eating with dentures or partials, if indicated, to determine if chewing problems or mouth pain are present.

6. Oral examination of residents who are uncooperative and do not allow for a thorough oral exam may result in medical conditions being missed. Referral for dental evaluation should be considered for these residents and any resident who exhibits dental or oral issues.

Coding Instructions

- Check L0200A, broken or loosely fitting full or partial denture: if the denture or partial is chipped, cracked, uncleanable, or loose. A denture is coded as loose if the resident complains that it is loose, the denture visibly moves when the resident opens his or her mouth, or the denture moves when the resident tries to talk.
- Check L0200B, no natural teeth or tooth fragment(s) (edentulous): if the resident is edentulous/lacks all natural teeth or parts of teeth.
- Check L0200C, abnormal mouth tissue (ulcers, masses, oral lesions): select if any ulcer, mass, or oral lesion is noted on any oral surface.
- Check L0200D, obvious or likely cavity or broken natural teeth: if any cavity or broken tooth is seen.
- Check L0200E, inflamed or bleeding gums or loose natural teeth: if gums appear irritated, red, swollen, or bleeding. Teeth are coded as loose if they readily move when light pressure is applied with a fingertip.
- Check L0200F, mouth or facial pain or discomfort with chewing: if the resident reports any pain in the mouth or face, or discomfort with chewing.
- Check L0200G, unable to examine: if the resident's mouth cannot be examined.
- Check L0200Z, none of the above: if none of conditions A through F is present.

Coding Tips

- Mouth or facial pain coded for this item should also be coded in Section J, items J0100 through J0850, in any items in which the coding requirements of Section J are met.
- The dental status for a resident who has some, but not all, of his/her natural teeth that do not appear damaged (e.g., are not broken, loose, with obvious or likely cavity) and who does not have any other conditions in L0200A–G, should be coded in L0200Z, none of the above.
- Many residents have dentures or partials that fit well and work properly. However, for individualized care planning purposes, consideration should be taken for these residents to make sure they are in possession of their dentures or partials and they are being utilized properly for meals, snacks, medication pass, and social activities. Additionally, the dentures or partials should be properly cared for with regular cleaning and by assuring they continue to fit properly throughout the resident's stay.

Definitions

Cavity: A tooth with a discolored hole or area of decay that may have debris in it.

Broken Natural Teeth or Tooth Fragment: Very large cavity, tooth broken off or decayed to gum line, or broken teeth (from a fall or trauma).

Oral Lesions: A discolored area of tissue (red, white, yellow, or darkened) on the lips, gums, tongue, palate, cheek lining, or throat.

Edentulous: Having no natural permanent teeth in the mouth. Complete tooth loss.

Oral Mass: A swollen or raised lump, bump, or nodule on any oral surface. May be hard or soft and with or without pain.

Ulcer: Mouth sore, blister, or eroded area of tissue on any oral surface.

References

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