Dental Care
Unmet oral needs of patients with cancer and survivors

Colleen Palay, BSN, RN, OCN

Cancer treatment can have serious, long-term, or lifelong oral side effects. Obtaining timely, proficient, and affordable dental care can be a challenge for anyone, particularly those with limited financial resources or who rely on Medicaid to cover the cost of care. For patients with cancer, finding knowledgeable, experienced, and willing dental practitioners to provide well-timed and necessary care within their means can be difficult. Traditional health insurance (including Medicare) does not cover dental care, even when medically necessary. Medicaid dental coverage varies widely across the country. The oncology team is in a position to educate patients on the dental side effects of treatment and to help them navigate the complex world of dental care.

Oral manifestations of cancer treatment include the following:
- Xerostomia
- Mucositis/atomatitis
- Infection (bacterial, fungal, or viral)
- Bleeding (because of thrombocytopenia)
- Caries
- Dysgeusia (alteration in taste sensation)
- Trismus
- Osteonecrosis
- Graft-versus-host disease (Hong & Napeñas, 2011)

Any of these conditions can cause pain and functional disability, as well as changes in appearance and quality of life. Patients diagnosed with head and neck cancer are particularly affected by these complications because of the site of disease, surgical management, tooth loss, and adjuvant therapies, including chemotherapy and radiation, which have significant side effects on teeth and surrounding structures (Turner, Mupparapu, & Akintoye, 2013).

The pediatric population is subject to the same oral side effects of treatment as adults. Children also face the risk of developmental dental and craniofacial abnormalities, particularly those who undergo treatment prior to the development of deciduous teeth (Effinger et al., 2014; Padmini & Bai, 2014). Children aged 3–5 years are subject to the most severe anomalies (McBride, 2011). Developmental deviations may include enamel hypoplasia, microdontia, malformation of the teeth and/or root structures, and potential agenesis of the primary or permanent teeth (Effinger et al., 2014; McBride, 2011).

Oral health and dental hygiene are often overlooked before, during, and after cancer treatment (Hartnett, 2015). Nurses are frequently at the front line of care to help patients and their families navigate diagnosis, treatment, and survivorship. They play a vital role in educating patients regarding self-care and treatment options and referring patients to dental providers skilled in the care of this complex population.

Adult and child cancer survivors, along with their family and caregivers, may not be aware of the unique oral health risks related to their treatment. All members of the healthcare team, including dentists, should work together to provide education, support, and appropriate treatment. The American Dental Association (2013) recommends at least annual visits for all individuals, with an increase in visits based on individual risk. Recommended frequency of dental visits for patients with cancer depends on the type of cancer, the patient’s condition, and sequelae of
Obstacles to Obtaining Dental Care

Patients with cancer and survivors need care by experienced, knowledgeable, and engaged dental professionals; however, they are at considerable risk for unmet oral care needs. Prevention, identification, and anticipation of potential oral side effects of cancer treatment is vital for patients with newly diagnosed cancer and survivors. General practice dentists frequently lack the education, training, and experience necessary to manage these patients (Epstein et al., 2014). General practice dentists account for about 80% of all currently practicing dental professionals (Kaiser Family Foundation, 2017), and dental coverage must be offered for children younger than 18 years; however, families are not mandated to purchase this coverage (CMS, 2013). Adult dental care is not considered to be an essential health benefit, and health insurance plans are not required to provide coverage, although dental insurance can be purchased as a stand-alone plan (CMS, 2013). The Children’s Health Insurance Program is a federal block grant program established in 1997 that helps states provide publicly funded insurance for uninsured children who are not eligible for Medicaid. Funding for this program has been extended to September 30, 2017 (Georgetown University Health Policy Institute Center for Children and Families, 2017). Given the present political climate, it is uncertain if this program will be funded by the time this article is published.

One of the hallmarks of the ACA is the expansion of Medicaid, which has provided dental coverage for people who otherwise would not be able to afford it, although coverage varies among states. The nation remains divided regarding the merits of the expansion of Medicaid and other aspects of the ACA. In May 2017, the U.S. House of Representatives passed the American Health Care Act by four votes (Congress.gov, n.d.). This legislation would reduce the number of people on Medicaid, limit funding, and allow states to waive essential health benefits (Reusch, 2017). All these factors are likely to affect dental health coverage for children and adults. Whether the ACA is fully repealed and replaced is uncertain (Congress.gov, n.d.). Regardless, in a time when healthcare dollars are limited, payment for

"Patients with cancer and survivors are at considerable risk for unmet oral care needs."

Legislation and Dental Care

The Patient Protection and Affordable Care Act (ACA) identifies pediatric dental care as an essential health benefit (Centers for Medicare and Medicaid Services [CMS], 2017), and dental coverage must be offered for children younger than 18 years; however, families are not mandated to purchase this coverage (CMS, 2013). Adult dental care is not considered to be an essential health benefit, and health insurance plans are not required to provide coverage, although dental insurance can be purchased as a stand-alone plan (CMS, 2013). The Children’s Health Insurance Program is a federal block grant program established in 1997 that helps states provide publicly funded insurance for uninsured children who are not eligible for Medicaid. Funding for this program has been extended to September 30, 2017 (Georgetown University Health Policy Institute Center for Children and Families, 2017). Given the present political climate, it is uncertain if this program will be funded by the time this article is published.

One of the hallmarks of the ACA is the expansion of Medicaid, which has provided dental coverage for people who otherwise would not be able to afford it, although coverage varies among states. The nation remains divided regarding the merits of the expansion of Medicaid and other aspects of the ACA. In May 2017, the U.S. House of Representatives passed the American Health Care Act by four votes (Congress.gov, n.d.). This legislation would reduce the number of people on Medicaid, limit funding, and allow states to waive essential health benefits (Reusch, 2017). All these factors are likely to affect dental health coverage for children and adults. Whether the ACA is fully repealed and replaced is uncertain (Congress.gov, n.d.). Regardless, in a time when healthcare dollars are limited, payment for
dental care is not likely to increase (see Figure 1).

Adult dental coverage through Medicaid varies by state (see Table 1). Many states offer limited or extensive coverage, and several states offer only emergency care (Hinton & Paradise, 2016). Some do not offer any dental benefits. Nationwide, only about 38% of dentists accept Medicaid (Hinton & Paradise, 2016). Even those who do accept Medicaid patients can limit the number of patients they see on the program. Many private practice dentists do not accept clients with Medicaid because of very low reimbursement rates for dental care and complex billing procedures.

One of the greatest risk factors for cancer is advanced age. The median age at the time of cancer diagnosis is 66 years (National Cancer Institute, 2015). Medicare is a major third-party payer in the reimbursement for cancer care in the United States. The Medicare law was signed into effect in 1965 and has remained largely unchanged since then. It contains a blanket statutory dental exclusion and does not cover routine oral examinations, screenings, cleanings, restorative services, dentures, or extractions. Limited exceptions to exclusions exist, but the criteria for coverage is complex and confusing. A noteworthy exception is the coverage of dental extractions in anticipation for radiation treatment of neoplasms of the jaw (CMS, 2013). In this case, the cost of the dental evaluation is covered if the patient needs extractions. Because dentists deal primarily in dental billing codes (not medical diagnosis codes), most do not understand how to bill for this type of care.

Access to care is more problematic for those with private dental insurance or the financial means to pay for dental care. However, employer-sponsored dental insurance typically covers only $1,000–$1,500 per year. This amount has remained largely unchanged since dental insurance was first offered 30 years ago (Vestal, 2015). Considering that the average cost of a root canal of a molar tooth is $1,000 (Burns, Vujicic, & Blatz, 2016), $1,500 is a modest allotment for any person needing substantial dental restoration in anticipation of cancer treatment.

**The Nurse’s Role in Dental Care**

Collectively, Americans spend about $2.75 billion per year on cosmetic dentistry to obtain or maintain a beautiful smile with a full contingent set of 32 teeth (Rabinowitz, 2017). In a surreal parallel, millions of working poor do not have dental insurance and do not qualify for public insurance, finding themselves on the wrong side of the dental divide in America. Few satisfactory options exist for this population, but may include safety net dental clinics, dental providers who sell services on credit, and free community service events. Many suffer with untreated dental problems. Receiving care at low-cost or free safety net clinics may require a wait of weeks or months for the first appointment, which is absolutely unacceptable for patients who need to start cancer treatment.

Obtaining dental care is unduly challenging for people newly diagnosed with cancer, particularly when cancer centers do not have dental providers. Patients need evaluation of and treatment for dental infection, caries, pain, xerostomia, and necrosis of the jaw, all of which can be lifelong issues. Involvement of experienced, competent, and engaged dental professionals is imperative, particularly for those with head and neck cancer, those who undergo hematopoietic stem cell transplantation, and/or those who are treated with high-dose chemotherapy regimens or parenteral bisphosphonate therapy.

Access to timely dental care is crucial but can be difficult to obtain. Identification of community dentists with experience or expertise in dental oncology is vital. For those who are insured by Medicaid or who have limited financial means to pay for treatment, safety net clinics may be the best or only option for care. Dental schools, community health centers, and community volunteer dentists can help care for patients. Nurses play a strong role in education, care coordination, and advocacy for people who find themselves in this unfortunate situation.

**Conclusion**

Oncology nurses often care for people who require medically necessary dental care. As strong patient advocates, they can work with their communities to develop healthcare networks that meet all the care needs of the population. Nationally, nurses should leverage their distinction as the most trusted professionals in the United States (Norman, 2016) and champion for a healthcare system with improved access to dental care for everyone.

**Colleen Palay, BSN, RN, OCN**, is an oncology nurse navigator at the University Hospitals Seidman Cancer

---

**Table 1.**

**MEDICAID DENTAL COVERAGE IN THE UNITED STATES**

<table>
<thead>
<tr>
<th>LEVEL OF COVERAGE</th>
<th>STATES</th>
<th>MEDICAID POPULATION</th>
<th>TOTAL POPULATION</th>
</tr>
</thead>
<tbody>
<tr>
<td>None</td>
<td>AL, AZ, DE, TN</td>
<td>4,394,929</td>
<td>19,397,630</td>
</tr>
<tr>
<td>Emergency care</td>
<td>FL, GA, HI, ID, ME, MD, MS, NH, NV, OK, TX, UT, WV</td>
<td>16,209,923</td>
<td>93,005,300</td>
</tr>
<tr>
<td>Limited benefits</td>
<td>AR, CO, DC, IL, IN, KS, KY, LA, MI, MN, MO, MT, NE, PA, SC, SD, VA, VT, WI</td>
<td>20,387,316</td>
<td>93,394,075</td>
</tr>
<tr>
<td>Extensive benefits</td>
<td>AK, CA, CT, IA, MA, NC, ND, NJ, NM, NY, OH, OR, RI, WA, WI</td>
<td>33,558,361</td>
<td>125,021,320</td>
</tr>
</tbody>
</table>

*From Kaiser Family Foundation, 2017
From U.S. Census Bureau, 2016
Note: Based on information from Hinton & Paradise, 2016; Kaiser Family Foundation, 2017; U.S. Census Bureau, 2016.

The author takes full responsibility for this content and did not receive honoraria or disclose any relevant financial relationships.

REFERENCES