

## CareQuest Cariology Curriculum Instructor Guide

### Session 7: Clinical Decision-Making: Applying Caries Risk Assessment to Patient-Centered Care

#### SESSION DETAILS

**Pedagogy:**

*Lecture:* Interactive Presentation

*In-Class Activity:*

1. Small Group Discussion

**Length:** 60 mins

**Description:**

Learners will apply caries risk assessment to two clinical case studies. Participants will identify disease indicators, risk factors, and protective factors, and use this information to determine caries risk level. Emphasis is placed on clinical reasoning and justification of decisions.

**Learning Objectives:**

- Identify disease indicators, risk factors, and protective factors.
- Determine caries risk level using clinical evidence.
- Justify their risk assessment using findings from the case.

#### PRE-SESSION PREP CHECKLIST

**Reading:**

- [Essentials of Dental Caries](#), Kidd et al., chapters 6 and 7
- [2021 CAMBRA article](#), Featherstone *et al.*

**Asynchronous:**

- CareQuest Self-Paced Course, [“Connecting Caries Risk Assessments and Cultural Awareness”](#)

**Synchronous:**

- CareQuest Session 6 [\[add clickable link\]](#)

**Materials**

- Printed case packets [\[add clickable link\]](#)
- Caries risk assessment forms
  - American Dental Association: [Caries Risk Assessment Form \(Age 0–6\)](#)
  - American Dental Association: [Caries Risk Assessment Form \(Age > 6\)](#)
- Slide deck

## SYNCHRONOUS CLASS TIMING LESSON PLAN

- Opening and Framing [5 minutes]
- Clinical Case 1 [20 minutes]
- Clinical Case 2 [20 minutes]
- Debrief & Wrap Up [5 minutes]

LESSON OUTLINE	INSTRUCTIONAL PROMPTS
<b>Opening Presentation</b> [Lecture, 5 minutes]	<b>Slide 1:</b> Introduce the session as an application-based lesson. <b>Slide 2:</b> Review objectives (brief). <b>Slide 3:</b> Address slide notes. Discussion with learners: <ul style="list-style-type: none"> <li>• If two patients receive the same prevention plan, will they have the same outcome? Why or why not?</li> <li>• What could go wrong if we skip risk assessment and go straight to prevention?</li> <li>• How does risk assessment change your clinical decision-making?</li> </ul>
<b>Clinical Case 1</b> [Small Group Discussion, 20 minutes]	<b>Slide 4:</b> Instruct groups to go work through Clinical Case 1 for 10 minutes. <b>Slides 5, 6, and 7:</b> Address content on the slide notes.
<b>Clinical Case 2</b> [Small Group Discussion, 20 minutes]	<b>Slide 8:</b> Instruct groups to go work through Clinical Case 2 for 10 minutes. <b>Slides 9 and 10:</b> Address content on the slide notes.
<b>Wrap Up</b> [Lecture, Class Discussion, 5 minutes]	<b>Slide 11 (final content slide):</b> Ask the learners: <ul style="list-style-type: none"> <li>• What factor most influenced your decisions today?</li> <li>• Where did uncertainty show up?</li> <li>• How did your thinking change from Case 1 to Case 2?</li> </ul> <p>Close with: Risk assessment is not a checklist. It requires clinical judgment and interpretation of multiple factors.</p>

## REFLECTION ACTIVITIES

Here are some questions you can use as discussion questions or opening questions to engage students.

1. If two patients receive the same prevention plan, will they have the same outcome? Why or why not?
2. What could go wrong if we skip risk assessment and go straight to prevention?
3. How does caries risk assessment change your clinical decision-making?

## Caries Risk Assessment Form (Age 0-6)

Patient Name: Carl Quest

Birth Date:

Date:

Age: 5

Initials:

		Low Risk	Moderate Risk	High Risk
<b>Contributing Conditions</b>		<b>Check or Circle the conditions that apply</b>		
I.	<b>Fluoride Exposure</b> (through drinking water, supplements, professional applications, toothpaste)	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No	
II.	<b>Sugary Foods or Drinks</b> (including juice, carbonated or non-carbonated soft drinks, energy drinks, medicinal syrups)	Primarily at mealtimes <input type="checkbox"/>	Frequent or prolonged between meal exposures/day <input type="checkbox"/>	Bottle or sippy cup with anything other than water at bed time <input checked="" type="checkbox"/>
III.	<b>Eligible for Government Programs</b> (WIC, Head Start, Medicaid or SCHIP) <b>Unknown</b>	<input type="checkbox"/> No		<input type="checkbox"/> Yes
IV.	<b>Caries Experience of Mother, Caregiver and/or other Siblings</b> <b>Unknown</b>	No carious lesions in last 24 months <input type="checkbox"/>	Carious lesions in last 7-23 months <input type="checkbox"/>	Carious lesions in last 6 months <input type="checkbox"/>
V.	<b>Dental Home:</b> established patient of record in a dental office	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No	
<b>General Health Conditions</b>		<b>Check or Circle the conditions that apply</b>		
I.	<b>Special Health Care Needs</b> (developmental, physical, medical or mental disabilities that prevent or limit performance of adequate oral health care by themselves or caregivers)	<input checked="" type="checkbox"/> No		<input type="checkbox"/> Yes
<b>Clinical Conditions</b>		<b>Check or Circle the conditions that apply</b>		
I.	<b>Visual or Radiographically Evident Restorations/ Cavitated Carious Lesions</b> <b>Patient's teeth hurt when chewing.</b>	No new carious lesions or restorations in last 24 months <input type="checkbox"/>		Carious lesions or restorations in last 24 months <input checked="" type="checkbox"/>
II.	<b>Non-cavitated (incipient) Carious Lesions</b>	No new lesions in last 24 months <input type="checkbox"/>		New lesions in last 24 months <input checked="" type="checkbox"/>
III.	<b>Teeth Missing Due to Caries</b> <b>Not at the moment because this is patient's first visit to the dentist</b>	<input checked="" type="checkbox"/> No		<input type="checkbox"/> Yes
IV.	<b>Visible Plaque</b>	<input type="checkbox"/> No	<input checked="" type="checkbox"/> Yes	
V.	<b>Dental/Orthodontic Appliances Present</b> (fixed or removable)	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes	
VI.	<b>Salivary Flow</b> <b>Unknown</b>	Visually adequate <input type="checkbox"/>		Visually inadequate <input type="checkbox"/>

Overall assessment of dental caries risk:

Low

Moderate

High

**Instructions for Caregiver:**

- Reduce frequency of snacking
- Select snacks that are high in protein
- Only water in a sippy cup - recommend switching to a regular cup
- Caregiver to help brush and floss patient's teeth two times a day
- Establish a dental home and recare visits at least every six months

## Caries Risk Assessment Form (Age >6)

Patient Name: Carrie Quest

Birth Date:

Date:

Age: 19

Initials:

		Low Risk	Moderate Risk	High Risk
<b>Contributing Conditions</b>		<b>Check or Circle the conditions that apply</b>		
I.	<b>Fluoride Exposure</b> (through drinking water, supplements, professional applications, toothpaste)	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No	
II.	<b>Sugary Foods or Drinks</b> (including juice, carbonated or non-carbonated soft drinks, energy drinks, medicinal syrups)	Primarily at mealtimes <input checked="" type="checkbox"/>		Frequent or prolonged between meal exposures/day <input type="checkbox"/>
III.	<b>Caries Experience of Mother, Caregiver and/or other Siblings</b> (for patients ages 6-14)	No carious lesions in last 24 months <input type="checkbox"/>	Carious lesions in last 7-23 months <input type="checkbox"/>	Carious lesions in last 6 months <input type="checkbox"/>
IV.	<b>Dental Home:</b> established patient of record, receiving regular dental care in a dental office	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No	
<b>General Health Conditions</b>		<b>Check or Circle the conditions that apply</b>		
I.	<b>Special Health Care Needs</b> (developmental, physical, medical or mental disabilities that prevent or limit performance of adequate oral health care by themselves or caregivers)	<input checked="" type="checkbox"/> No	Yes (over age 14) <input type="checkbox"/>	Yes (ages 6-14) <input type="checkbox"/>
II.	<b>Chemo/Radiation Therapy</b>	<input checked="" type="checkbox"/> No		<input type="checkbox"/> Yes
III.	<b>Eating Disorders</b>	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes	
IV.	<b>Medications that Reduce Salivary Flow</b>	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes	
V.	<b>Drug/Alcohol Abuse</b>	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes	
<b>Clinical Conditions</b>		<b>Check or Circle the conditions that apply</b>		
I.	<b>Cavitated or Non-Cavitated (incipient) Carious Lesions or Restorations</b> (visually or radiographically evident)	No new carious lesions or restorations in last 36 months <input type="checkbox"/>	1 or 2 new carious lesions or restorations in last 36 months <input type="checkbox"/>	3 or more carious lesions or restorations in last 36 months <input checked="" type="checkbox"/>
II.	<b>Teeth Missing Due to Caries in past 36 months</b>	<input checked="" type="checkbox"/> No		<input type="checkbox"/> Yes
III.	<b>Visible Plaque</b>	<input type="checkbox"/> No	<input checked="" type="checkbox"/> Yes	
IV.	<b>Unusual Tooth Morphology</b> that compromises oral hygiene	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes	
V.	<b>Interproximal Restorations - 1 or more</b>	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes	
VI.	<b>Exposed Root Surfaces Present</b>	<input type="checkbox"/> No	<input checked="" type="checkbox"/> Yes	
VII.	<b>Restorations with Overhangs and/or Open Margins; Open Contacts</b> with Food Impaction	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes	
VIII.	<b>Dental/Orthodontic Appliances</b> (fixed or removable)	<input type="checkbox"/> No	<input checked="" type="checkbox"/> Yes	
IX.	<b>Severe Dry Mouth (Xerostomia)</b>	<input checked="" type="checkbox"/> No		<input type="checkbox"/> Yes

**Overall assessment of dental caries risk:**  Low  Moderate  High

**Patient Instructions:**

- Recare visits at least every six months
- Floss daily
- Fluoride varnish application at recare visits