

UCLA Center for Maximizing Outcomes & Research on Effectiveness- C-MORE

**To Measure or Not to Measure?
Usability of Common Health Literacy Assessment Tools
for Race/Ethnic Populations**

**C-MORE
Health Literacy Seminar Series**

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C-MORE Health Literacy Seminars

OBJECTIVES

- **Provide a forum** for the scholarly exchange of evidence-based, comparative effectiveness research & innovations for defining and enhancing the acquisition of general and disease specific health literacy
- **Promote interactive discussion** of current & new models and methods for enhancing the usability of health information & health-related surveys
- **Inculcate rigorous application of qualitative methods** to examine and promote linguistic & cultural appropriateness of health literacy interventions & measures
- **Increase awareness of patient-centered and ethno-medical perspectives** for implementing health services research addressing health literacy among vulnerable populations (aging, the poor, race/ethnic minorities)

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C-MORE Perspective 1

Primary Objective of Improving Health Literacy?

To enhance a person's capacity
to effect behavioral changes
that may translate into improved
health-related quality-of-life outcomes

Behavioral Change!!

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Health Literacy-Institute of Medicine

Ability to obtain, process, & understand basic health information
needed to make appropriate health decisions and follow
instructions for treatment

ability to obtain	Access
process	Navigation
understand	Knowledge

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Health Literacy-World Health Organization

Achieving a level of knowledge, personal skills and confidence to take action to improve personal and community health by changing personal lifestyles and living conditions

knowledge	Learning
personal skills	Self-management
confidence	Self-efficacy

Behavioral Change

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C-MORE Perspective 2

Between **ability to obtain** (IOM) and **achieving** (WHO) health literacy there remains a substantial gap in our understanding about how best to improve access to understandable and culturally relevant health information to enhance health literacy and usable surveys to assess health literacy

Barriers to Mitigating Health Disparities

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Components of Health Literacy

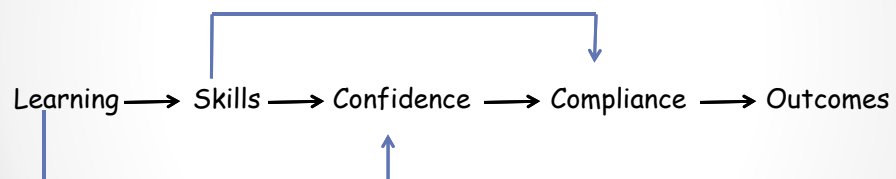
based on the IOM & WHO definitions

- ✚ Learning
- ✚ Skills building
- ✚ Confidence
- ✚ Compliance
- ✚ Outcomes

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C-MORE Perspective 3

Health Literacy Components Model



Desirable components for health literacy measurement?

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Translating Health Literacy Components to Constructs for Health Literacy Measurement

HL Component

- ✚ Learning
- ✚ Skills building
- ✚ Confidence
- ✚ Compliance
- ✚ Outcomes

HL Construct

- knowledge
- self-management
- self-efficacy
- behavioral change
- HRQoL

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C-MORE Perspective 4

Types of Health Literacy

General Health Literacy

What everyone **should know** about health in general

• • •

Disease Specific Health Literacy

What a person **must know** about their specific health condition

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General Health Literacy

Things everyone should know about!

- Chronic diseases: Epidemiology and community level risks
- Primary prevention: Immunization, nutrition, physical activity
- Secondary prevention: Screening- mammography, biomarkers
- Access to healthcare: Insurance types, uninsured access

C-MORE Perspective 5

Disease Specific Health Literacy

The degree to which a person's level of knowledge,
self-management skills & confidence permits compliance
with clinical management of disease-specific health
conditions, and effects HRQoL outcomes

Disease Specific Health Literacy

- Knowledge: Risk factors, signs & symptoms, prevention
- Skills: Self-management, nutrition, physical activity
- Confidence
- Compliance: Visits, testing, monitoring, specialty-care, treatment
- Outcomes: general, physical and emotional well-being

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Health Literacy Measures?

Newest Vital Sign	REALM	SAHLSA	S-TOFHLA
NewestVitalSign.org	Rapid Estimate of Adult Literacy in Medicine	Short Assessment of Health Literacy: Spanish-speaking Adults	Short Test of Functional Health Literacy in Adults
Clinical assessment	Clinical and research	Clinical assessment	Research
Review nutrition label. Respond to 6 items	Read 66 words. Scored on correct pronunciation.	Select meaning of 50 words. Scored on number correct	Fill in missing words in 4 numerical items and 2 prose passages
English Yes Spanish Yes	English Yes Spanish Yes	English No Spanish Yes	English Yes Spanish Yes

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The Newest Vital Sign

Uses an Ice Cream Label

- ✚ Administered when other vital signs are measured
- ✚ 6 questions are asked; 1 point per question
- Score of 0-1 suggests high likelihood (50% or more) of limited literacy
- Score of 2-3 indicates the possibility of limited literacy
- Score of 4-6 almost always indicates adequate literacy

http://www.pfizer.com/files/health/nvs_flipbook_english_final.pdf

NOTE: Verbal introduction is 4 sentences long with 11th grade reading level
ORACY?

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The Newest Vital Sign



Nutrition Facts		
Serving Size		½ cup
Servings per container		4
Amount per serving		
Calories	250	Fat Cal 120
		%DV
Total Fat	13g	20%
Sat Fat	9g	40%
Cholesterol	28mg	12%
Sodium	55mg	2%
Total Carbohydrate	30g	12%
Dietary Fiber	2g	
Sugars	23g	
Protein	4g	8%

*Percentage Daily Values (DV) are based on a 2,000 calorie diet. Your daily values may be higher or lower depending on your calorie needs.

Ingredients: Cream, Skim Milk, Liquid Sugar, Water, Egg Yolks, Brown Sugar, Milkfat, Peanut Oil, Sugar, Butter, Salt, Carrageenan, Vanilla Extract.

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REALM-R

- ✚ The REALM-R is a brief screening instrument
- ✚ Assess adult patient's ability to read common medical words.
- ✚ Designed to assist in identifying patients with poor literacy skills.
- ✚ REALM-R is a **word recognition** test
- ✚ Not a reading comprehension instrument

<http://www.ahrq.gov/professionals/quality-patient-safety/pharmhealthlit/realm-r.html>

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REALM-R Examiner Record

Patient Name/ _____
Subject # _____ Date of Birth _____
Date _____ Clinic _____ Examiner _____

Reading Level _____
Grade Completed _____

fat	fatigue	___
flu	directed	___
pill	colitis	___
allergic ___	constipation	___
jaundice ___	osteoporosis	___
anemia ___		

Fat, Flu, and Pill are not scored. We have previously used a score of 6 or less to identify patients at risk for poor literacy.

Score _____ (6 or less considered a risk for limited literacy)

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SAHLSA-50

The Short Assessment of Health Literacy for Spanish Adults

- ✦ Based on the REALMs use of single words
- ✦ Not a word recognition test; a word meaning test
- ✦ Subject reads a word and chooses between a key (correct) and a distractor (incorrect) word
- ✦ Includes a 'don't know' option

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Short Assessment of Health Literacy for Spanish Adults (SAHLSA-50)

The Short Assessment of Health Literacy for Spanish Adults (SAHLSA-50) is a validated health literacy assessment tool containing 50 items designed to assess a Spanish-speaking adult's ability to read and understand common medical terms. The SAHLSA was based on the Rapid Estimates of Adult Literacy in Medicine (REALM), known as the most easily administered tool for assessing health literacy in English.

Stem	Key or Distracter		
1. próstata	__glándula	__circulación	__no se
2. empleo	__trabajo	__educación	__no se
3. menstrual	__mensual	__diario	__no se
4. gripe	__sano	__enfermo	__no se
5. avisar	__medir	__decir	__no se
6. comidas	__cena	__paseo	__no se
7. alcoholismo	__adicción	__recreo	__no se
8. grasa	__naranja	__manteca	__no se
9. asma	__respirar	__piel	__no se
10. cafeína	__energía	__agua	__no se
11. osteoporosis	__hueso	__músculo	__no se
12. depresión	__apetito	__sentimientos	__no se
13. estreñimiento	__bloqueado	__suelto	__no se
14. embarazo	__parto	__niñez	__no se
15. incesto	__familia	__vecinos	__no se
16. pastilla	__tableta	__galleta	__no se
17. testículo	__óvulo	__esperma	__no se

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Short Test of Functional Health Literacy in Adults S-TOFHLS

Uses the CLOZE Procedure

✚ 4 numeracy items

- Take medication every 6 hours
- Normal blood sugar
- Appointment time
- Taking medication on empty stomach

✚ 2 reading passages

Passage A: Preparation for upper GI 4th grade level

Passage B: Medicaid rights and responsibilities 10th grade level

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Your doctor has sent you to have a _____ X-ray.

- a. stomach
- b. diabetes
- c. stitches
- d. germs

S-TOFHLS Passage A

You must have an _____ stomach when you come for _____.

- a. take
- b. empty
- c. incest
- d. anemia
- a. is
- b. am
- c. if
- d. it

The X-ray will _____ from 1 to 3 _____ to do.

- a. take
- b. view
- c. talk
- d. look
- a. beds
- b. brains
- c. hours
- d. diets

THE DAY BEFORE THE X-RAY

For supper have only _____ snack of fruit _____ and jelly, with coffee or tea.

- a. little
- b. broth
- c. attack
- d. nausea
- a. toes
- b. throat
- c. toast
- d. thigh

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