Diagnosis of Dementia in Primary Care

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Objectives

- Understand the steps in work-up for dementia

- Identify the basic ways to test for cognitive impairment and dementia and how to use those tests in different settings

- Understand the steps in delivering a dementia diagnosis

How good are we?

– How many of you right now could tell me the difference between Alzheimer's and dementia?

– How many of you right now feel comfortable testing for dementia?

– Diagnosing dementia?

GP and diagnosis

- Trouble with normal aging vs dementia

- Issues with recognizing early symptoms and dealing with behaviors/symptoms

- Lack confidence

- Doubt diagnostic expertise

- Assume dementia diagnosis should be made by a specialist

Boise L, Camicioli R, Morgan DL, Rose JH, Congleton L. Diagnosing dementia: perspectives of primary care physicians. Gerontologist. Aug 1999;39(4):457-464
Cahill S, Clark M, Walsh C, O'Connell H, Lawlor B. Dementia in primary care: The first survey of Irish general practitioners. International Journal of Geriatric Psychiatry. 2006;21(4):319-324.
Brodaty H, Howarth GC, Mant A, Kurrle SE. General practice and dementia. A national survey of Australian GPs. Medical Journal of Australia. Jan 3 1994; 160(1):10-14

Geriatricians and Neurologists?

- Aren't they our friends?

- Can't they just do all of the work?

- North Carolina has 216 certified geriatricians as of 2014- projected need # to train between now and 2030 is 715

Geriatrician projections…
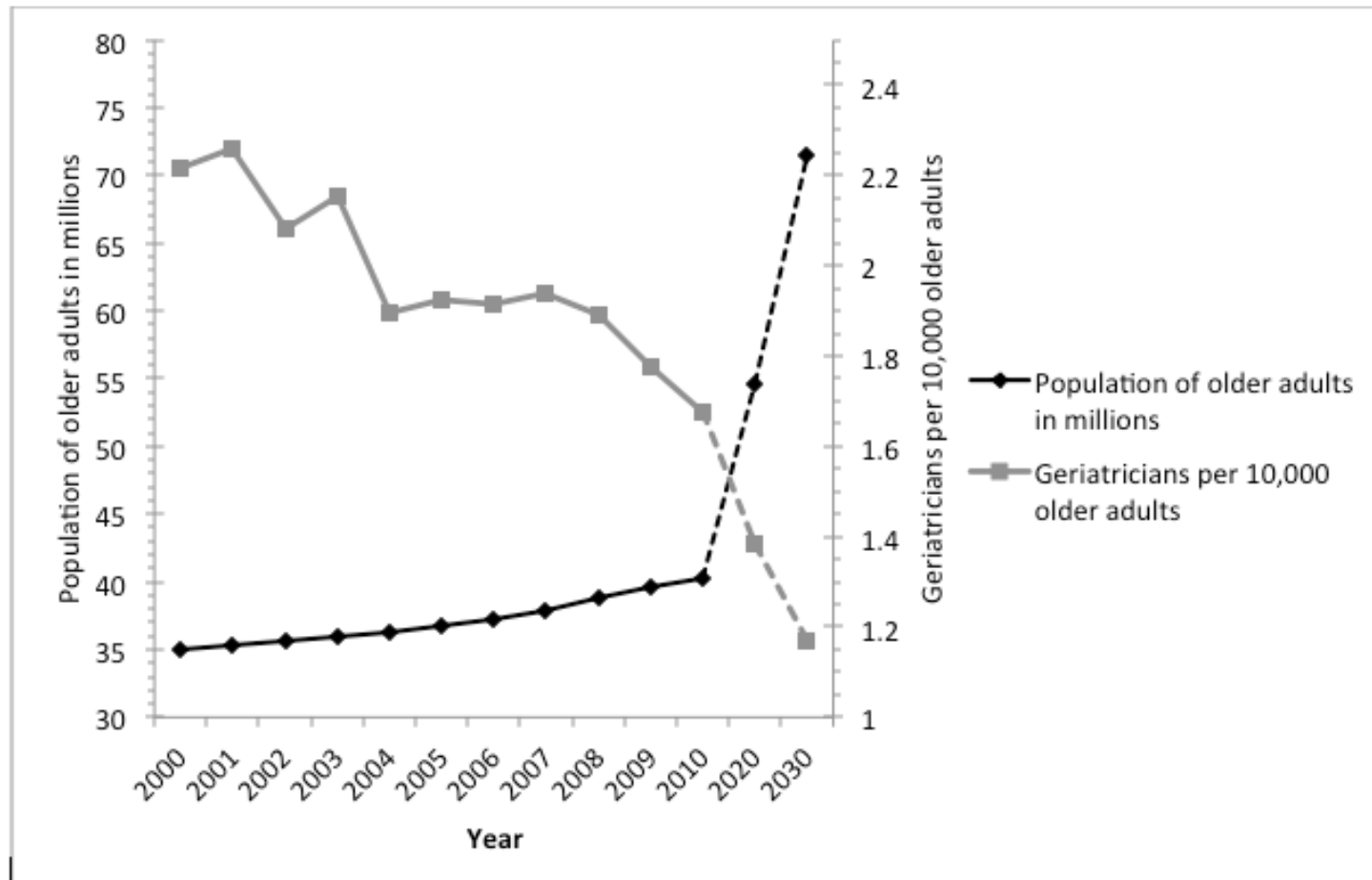
Survey of Providers at CIH

- 18 total responders

- 5 question survey about diagnosing dementia

- 61% had diagnosed dementia before

- Most were "fairly confident" in their ability to diagnose (39%)

- BUT, 22% were not confident at all, and NOBODY was "very confident"

What makes you hesitant to diagnose dementia?

not enough experience with diagnosing	33.33% 6
–worried about implications of making that diagnosis	27.78% 5
–unsure of management after diagnosis	0.00% 0
–not enough time	11.11% 2
–nothing- I am confident with diagnosing dementia	11.11% 2
–Responses Other (please specify)	16.67% 3

Other

- having the right diagnostic tool to do it

- Both a & b (not enough experience with diagnosing, and worried about implications of the diagnosis)

- NOT IN MY SCOPE OF PRACTICE

What would help you be able to diagnose dementia?

- more education and more resources

- education and time

- More time; cheat sheet with diagnostic criteria

- I feel like the PCP or geriatrician should be the one to diagnose dementia.

- ANOTHER DEGREE

- information and support (consult) if suspicious

- Education CME

What would help?

- Additional training, discussion of implications of dx, and of what my role in early dx should be.

- More education about dementia types, resources for diagnosing (survey, criteria etc.)

- More education and time for exam.

What would help?

- I love being able to refer to geriatrician because I think cognitive complaints deserve attention and a comprehensive workup which is possible in that context.

- more information about types

- Assistance w administering instruments like the SLUMS.

- more time to do evaluation

- More education and experience. I have never worked in the outpatient setting other than residency.

What would help?

- I always appreciate more education in making sure I get the diagnosis right.

- More education about dementia and types, testing and interpreting, knowledge of resources and treatments available.

- education on how to use tool to tell the kinds apart

Ten warning signs

Confusion with time or place

Memory loss that affects daily life

Trouble with completing daily tasks

Trouble with visual images/spatial relationships

Difficulty with planning or solving problems

Warning signs (cont.)

New problems with words

Withdrawing from usual activities

Misplacing things

Changes in mood or personality

Poor judgment or decision-making

alz.org

Community Support

Supporting one another rather than 'help-seeking'

we usually think of the person seeking help

shift to the community and the collective offering support

help the elder who will not likely "seek help"

Rationale for Timely Detection

1.Patient Care / Outcomes

2.Time

3.Money

Patient Outcomes

1. Improve quality of life

2. support independence by ensuring happy/healthy and safe environment

3. better management of other medical problems

4. Reduce ineffective, expensive, crisis-driven use of healthcare resources

5. Treat reversible causes:
   - Normal pressure hydrocephalus(NPH)
   - Thyroid-stimulating hormone (TSH)
   - Vitamin B12 deficiency
   - Hypoglycemia
   - Depression

History and the physical

- History comes from patient AND family

- AD8

- Testing- mini-Cog OR GPCOG and family questionnaire (AD8)

- IF POSITIVE- move on to more detailed test (MOCA, SLUMS, MMSE)

Checklist

- Review the specifics of the memory problem/symptoms: onset, course, severity, behaviors, psychosocial issues, other medical problems. Hallucinations and WHEN they started? Education level-

- Assess function: poor vision or hearing?, ADLs and IADLs, compliance, finances

- Assess mental health

- Perform a neuro exam-

Mini- COG

1. Instruct the patient to listen carefully and repeat the following APPLE WATCH PENNY

2. Administer the Clock Drawing Test

3. Ask the patient to repeat the three words given previously

_____ _____ _____

Mini-COG

Scoring

Number of correct items recalled _____ [if 3 then negative screen. STOP]

If answer is 1-2

Is CDT Abnormal? No Yes

If No, then negative screen

If Yes, then screen positive for cognitive impairment

GPCOG Screening Test

Step 1: Patient Examination Unless specified, each question should only be asked once Name and Address for subsequent recall test 1. "I am going to give you a name and address. After I have said it, I want you to repeat it. Remember this name and address because I am going to ask you to tell it to me again in a few minutes: John Brown, 42 West Street, Kensington." (Allow a maximum of 4 attempts).

Time Orientation - Correct Incorrect

2. What is the date? (exact only)

Clock Drawing – use blank page

3. Please mark in all the numbers to indicate the hours of a clock (correct spacing required) 4. Please mark in hands to show 10 minutes past eleven o'clock (11.10)

Information

5. Can you tell me something that happened in the news recently? (Recently = in the last week. If a general answer is given, eg "war", "lot of rain", ask for details. Only specific answer scores).

Recall

6. What was the name and address I asked you to remember John Brown 42 West (St) Kensington (To get a total score, add the number of items answered correctly)
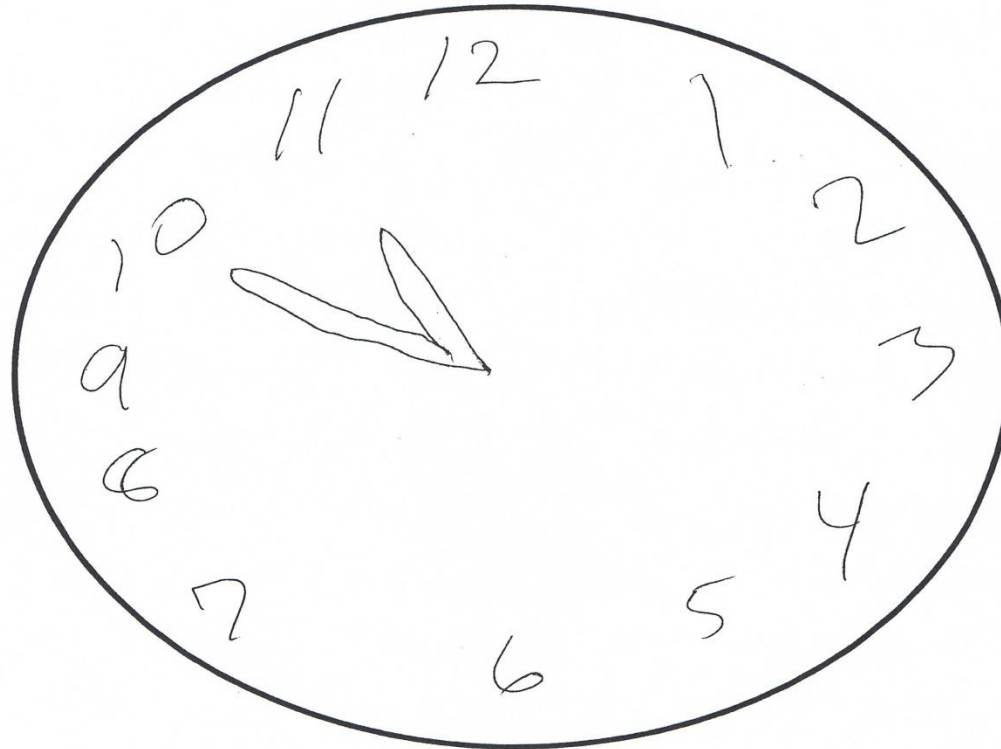
Total correct (score out of 9) If patient scores 9, no significant cognitive impairment and further testing not necessary. If patient scores 5-8, more information required. Proceed with Step 2, informant section. If patient scores 0-4, cognitive impairment is indicated. Conduct standard investigations.

Abnormal clock?
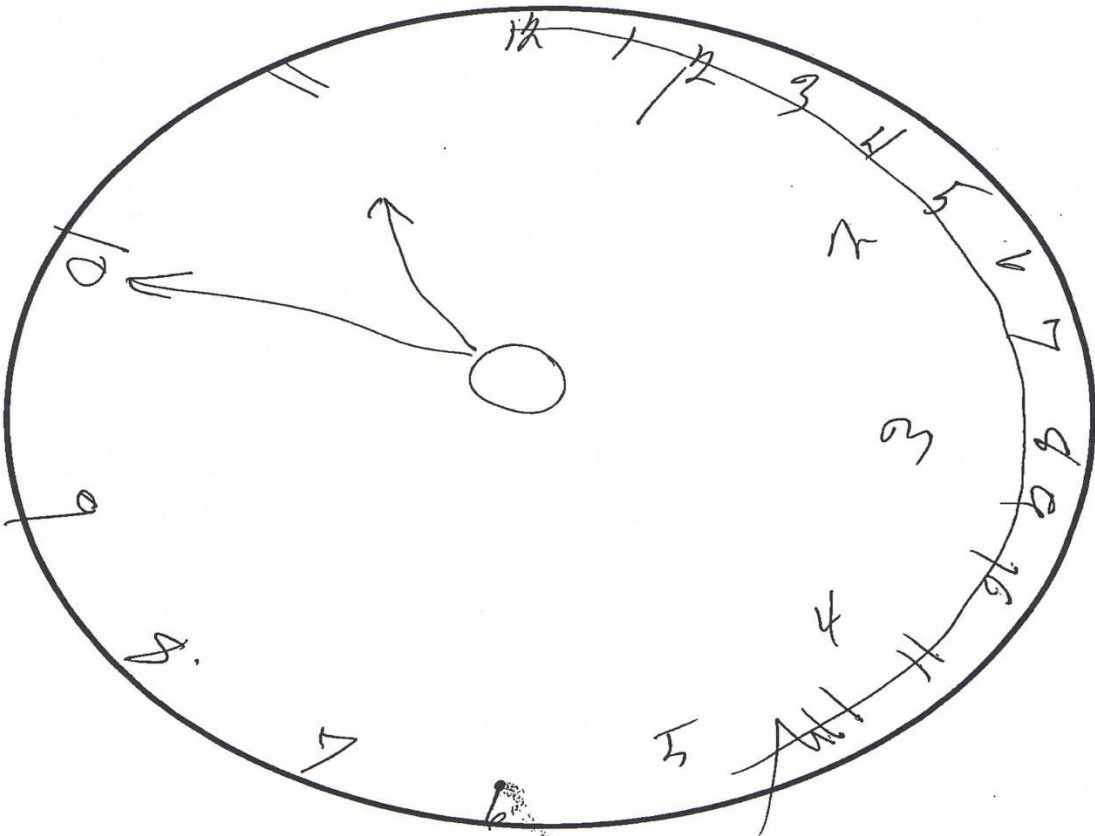
Clock Drawing Test

Patient's Name: ~~Helen M. Bradley~~   Date: 3-30-16

Clock Drawing Test

Patient's Name: ~~Ned Smith~~   Date: 12-10-15
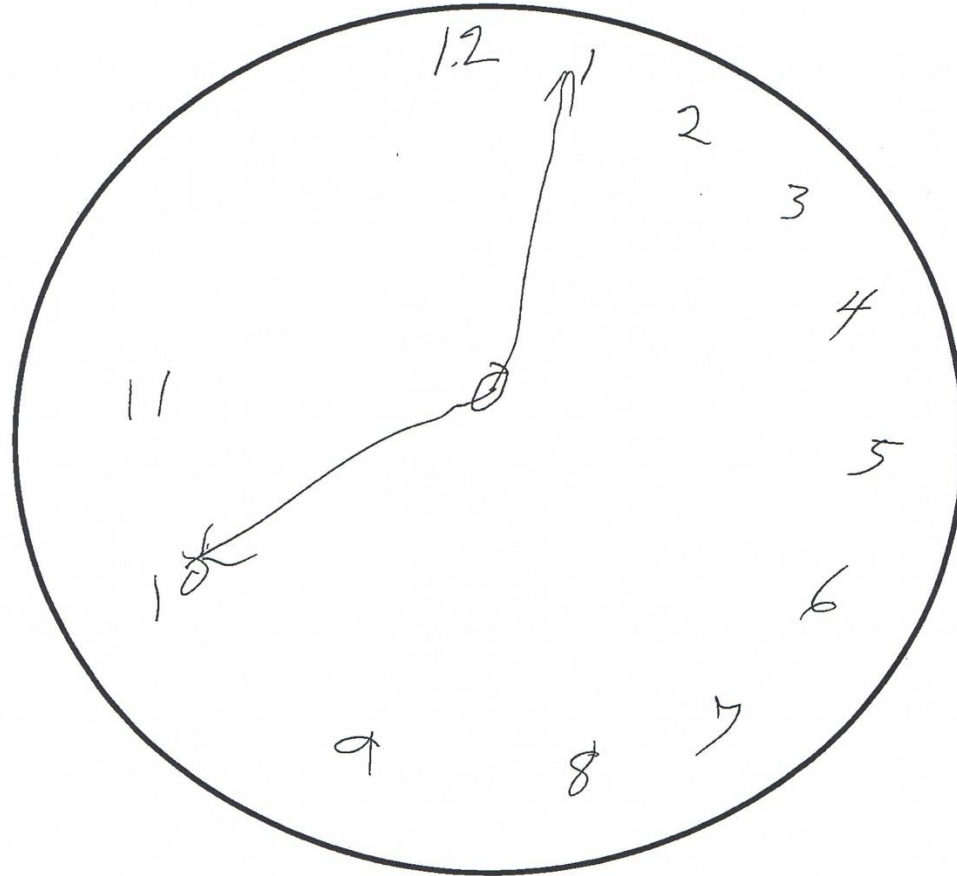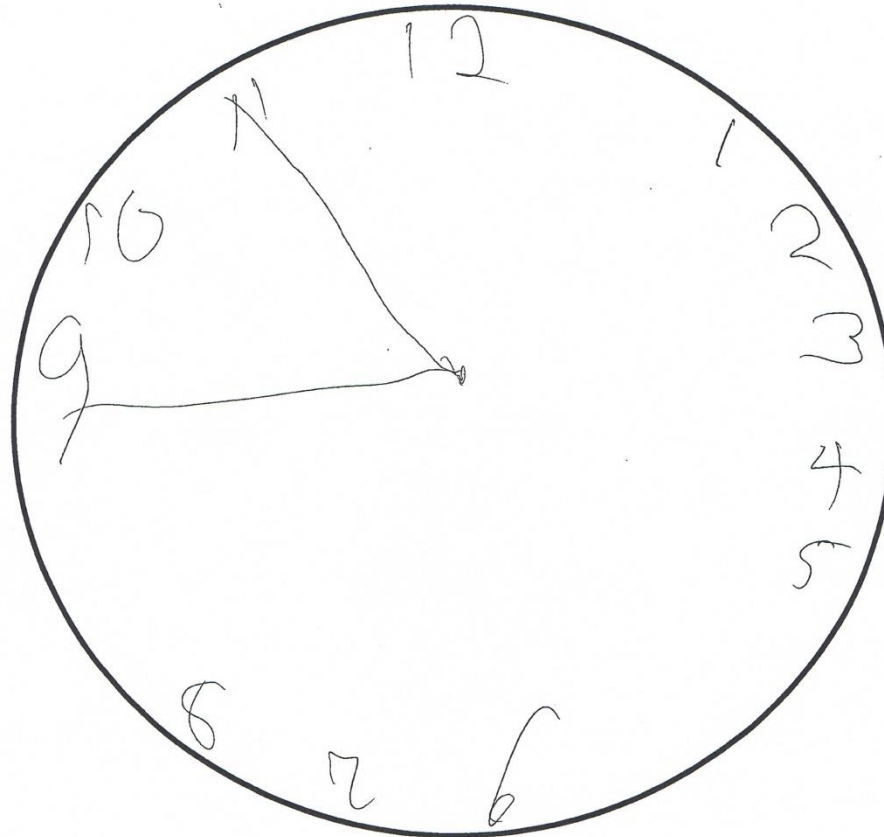
Date: 3-30-16
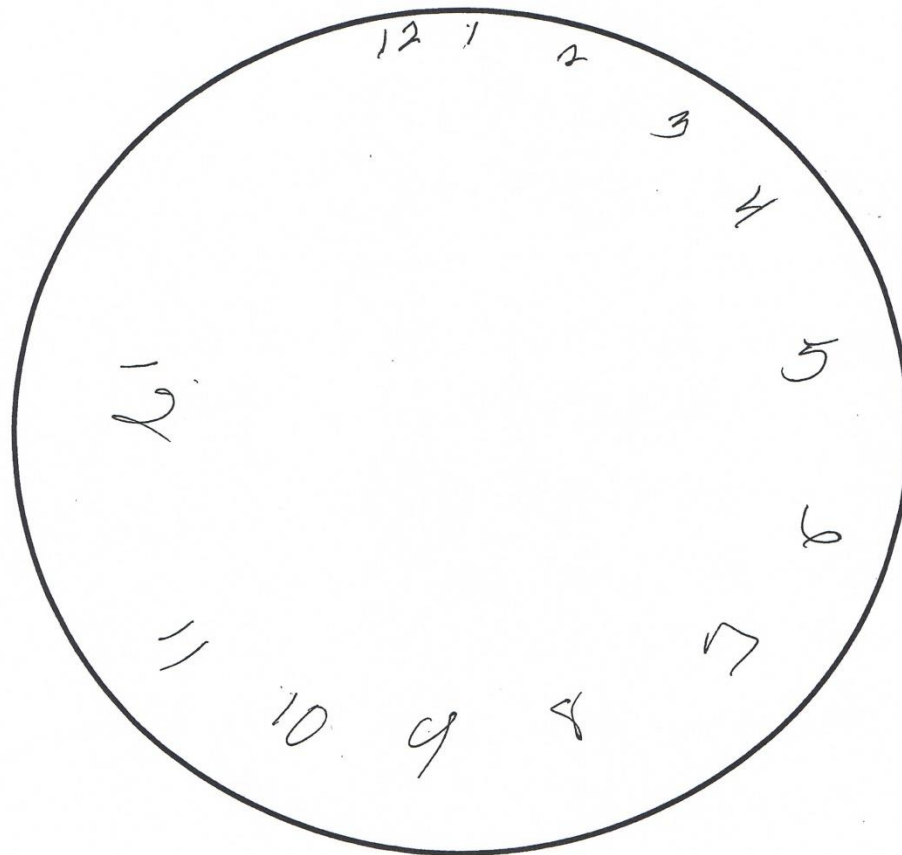
Clock Drawing Test

Patient's Name: ████ ████   Date: 3·16·16

Checklist, continued

- Diagnostics:
  - Lab tests: CBC, CMP,
  - TSH, B12
  - RPR, HIV, heavy metals
  - Imaging:
    - CT or MRI if indicated

Some issues with testing

Memory related to oral tradition- no context in testing, meaningless. Without a story or who somebody is, where fact comes from, it doesn't make sense.

Anglo-Americans are used to being given isolated facts as presented in test-taking situations

AIANs have more difficulty when the testing information has no special significance

Questions involving historical facts/current events- president, may not be relevant. Possibly asking about Chief, Council, recent pow-wow would be better

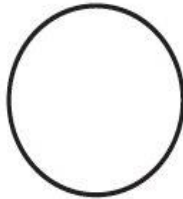# Other issues

Illiterate?

*Blessed test or Short Blessed Test

Vision issues?

*Verbal fluency, Category Fluency

Cultural considerations

Traditions/beliefs

Name_____ Age_____

Is the patient alert?_____ Level of education_____

__/1	**1** 1. What day of the week is it?
__/1	**1** 2. What is the year?
__/1	**1** 3. What state are we in?

4. Please remember these five objects. I will ask you what they are later.

     Apple   Pen   Tie   House   Car

5. You have $100 and you go to the store and buy a dozen apples for $3 and a tricycle for $20.

  1 How much did you spend?

__/3 **2** How much do you have left?

6. Please name as many animals as you can in one minute.

__/3   **0** 0-4 animals   **1** 5-9 animals   **2** 10-14 animals   **3** 15+ animals

__/5 7. What were the five objects I asked you to remember? 1 point for each one correct.

8. I am going to give you a series of numbers and I would like you to give them to me backwards. For example, if I say 42, you would say 24.

__/2   **0** 87   **1** 648   **1** 8537

9. This is a clock face. Please put in the hour markers and the time at ten minutes to eleven o'clock.

  2 Hour markers okay

__/4 **2** Time correct

1 10. Please place an X in the triangle.

__/2 **1**   Which of the above figures is largest?

11. I am going to tell you a story. Please listen carefully because afterwards, I'm going to ask you some questions about it.

Jill was a very successful stockbroker. She made a lot of money on the stock market. She then met Jack, a devastatingly handsome man. She married him and had three children. They lived in Chicago. She then stopped work and stayed at home to bring up her children. When they were teenagers, she went back to work. She and Jack lived happily ever after.

__/8

2 What was the female's name?   **2** What work did she do?

2 When did she go back to work?   **2** What state did she live in?

_____ **TOTAL SCORE**

SCORING		
HIGH SCHOOL EDUCATION		**LESS THAN HIGH SCHOOL EDUCATION**
27-30	NORMAL	25-30
21-26	MILD NEUROCOGNITIVE DISORDER	20-24
1-20	DEMENTIA	1-19

Story Recall- American Indian style

I am going to tell you a story. Please listen carefully because afterwards, I'm going to ask you some questions.

"Bill grew up learning to carve. He carved a lot of famous stone wolves that made it into the museum. He married Jean, had three children, and they live across the river up in Big Cove. One time, Bill traveled out to Tahlequah for Homecoming to see his cousin Shelby. She died a couple of years ago from lung cancer. Bill and Jean now have ten grand-children and like to go on Senior trips."

What kind of carvings did Bill do?

What is Bill's wife's name?

What state did Bill go to for Homecoming?

How did Bill's cousin die?

Trail Making Test Part B

Patient's Name: _____   Date: _____

Hospital setting

- Be very careful in trying to diagnose inpatient

- May be delirium

- Test concentration FIRST

- Must address other untreated conditions (depression, thyroid issues, infection), then re-test and evaluate outpatient
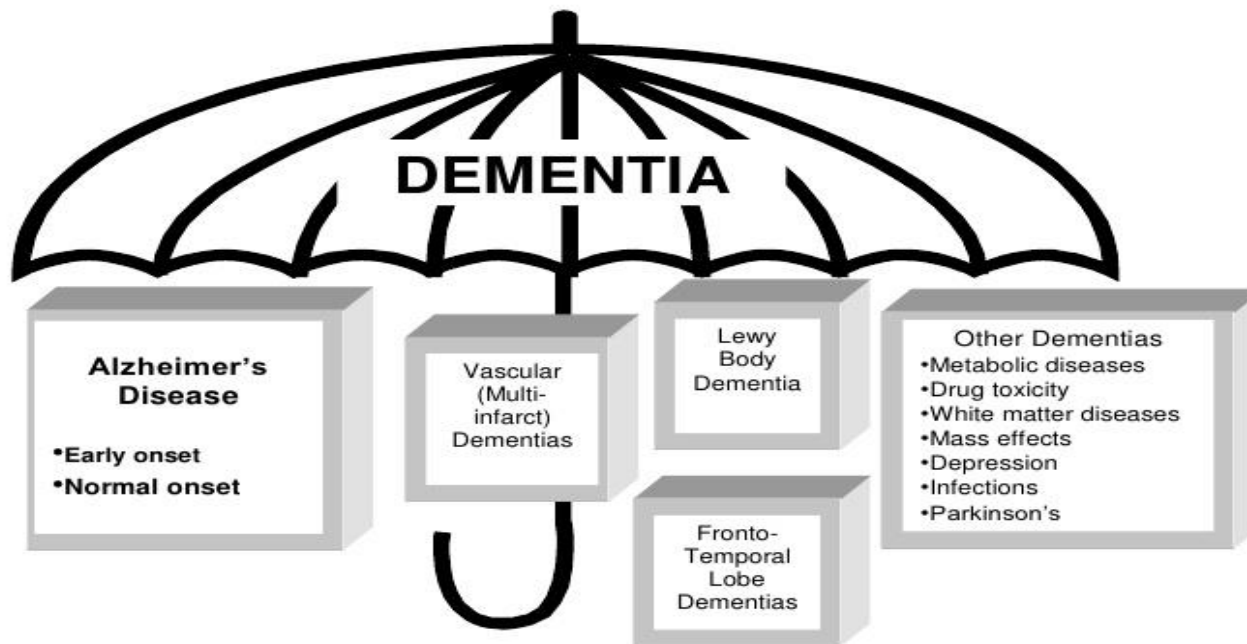
Mild Cognitive Impairment

- Have noticeable problems that DON'T interfere with daily life

- May show up on testing

- Some progress to dementia, some don't

- Excellent time to talk about risk factors, encourage exercise, quit smoking, brain health

- Monitor

So, it's dementia. What kind?

- If you want to guess, guess Alzheimer's
  - you will be right 60-80% of the time

- They say vascular is 10%. I think they LIE.

- If you have two or more symptoms or types of dementia, it's MIXED

- If they have: hallucinations, Parkinsonian features, aphasia/speech issues, involuntary movements or SUDDEN/SEVERE changes in behavior-get help

DEMENTIA

Alzheimer's Disease
- Early onset
- Normal onset

Vascular (Multi-infarct) Dementias

Lewy Body Dementia

Fronto-Temporal Lobe Dementias

Other Dementias
- Metabolic diseases
- Drug toxicity
- White matter diseases
- Mass effects
- Depression
- Infections
- Parkinson's

Alzheimer's
- New info lost
- Recent memory worse
- Problems finding words
- Mis-speaks
- More impulsive or indecisive
- Gets lost
- Notice changes over 6 months – 1 year

Vascular
- Sudden changes
- Picture varies by person
- Can have bounce back & bad days
- Judgment and behavior 'not the same'
- Spotty losses
- Emotional &energy shifts

Lewy Body
- Movement problems - Falls
- Visual Hallucinations
- Fine motor problems – hands & swallowing
- Episodes of rigidity & syncopy
- Nightmares
- Fluctuations in abilities
- Drug responses can be extreme & strange

Frontal-Temporal
- Many types
- Frontal – impulse and behavior control loss
  - Says unexpected, rude, mean, odd things to others
  - Dis-inhibited – food, drink, sex, emotions, actions
- Temporal – language loss
  - Can't speak or get words out
  - Can't understand what is said, sound fluent – nonsense words

Vascular dementia

Increasing age

History of heart attack, strokes or mini strokes/the leading cause of death in AI/AN is Heart disease. Stroke is the 6th

Atherosclerosis

High cholesterol

High blood pressure

Diabetes/Likelihood of AIAN to have DM compared to non-Hispanic white= 2.2

Smoking/29.2 percent of AI/AN currently smoke, compared to 18.2 percent of Whites

Obesity

Atrial fibrillation

- http://www.cdc.gov/dhdsp/data_statistics/fact_sheets/fs_aian.htm

Delivering the Diagnosis

General guidelines:

Family MUST be present whenever possible

Talk <u>directly</u> to the person with dementia

Summarize test results in plain language

Answer all questions

Ask patient/family to repeat back what they have heard

Make sure all family members hear the same message, are on the same page

Delivering the Diagnosis

Address immediate problems and concerns:

Management of meds, finances, meals

Driving and Home safety

Caregiver burnout & Social isolation

Inactivity/lack of exercise

Encourage family involvement/assignments

Family need to accompany patient to doctor appts.

Resources

Follow up

What NOT to do with diagnosis

- In general, timelines don't help
  - I don't give them unless people insist

- Don't layout instructions way into the future

- Don't destroy hope

- Be wary of family members looking to take advantage/watch for elder abuse

- Don't allow the person to think he/she won't be productive anymore!

Bottom Line

- You CAN make the diagnosis and manage many cases of dementia

- Look into resources in your area- memory centers, specialists

- Work on early recognition

- Help with education in your area