BACKGROUND
Busy primary care internists do not have time for long screening algorithms to detect mental illness; they need time-efficient, case-finding strategies. For example, in screening for mood disorders, asking one question, “Do you feel depressed?” has a sensitivity of approximately 90%. Screening for cognitive disorders in outpatients has usually required applying the Mini Mental Status Exam (MMSE). For many physicians the MMSE is hard to remember and is time consuming. Critchley first described the Clock Drawing Test (CDT) in 1953. In its current format, it requests the subject to fill in the numbers on a predrawn circle and then add the hands for a designated time. The Mini-Cog combines the 3-item recall from the MMSE and the CDT.

AIM
To evaluate the Mini-Cog (3-item recall and Clock Drawing Test), a case-finding strategy for cognitively impaired adults.

METHODS
249 community dwelling, subjects (173 women, 76 men) were evaluated in a university memory clinic. All subjects completed the MMSE, CASI (Cognitive Abilities Screening Instrument) and the Mini-Cog. Expert raters preformed the MMSE and CASI and
“naïve” raters preformed the Mini-Cog. Results were compared between rating instruments and raters.

**MAIN FINDINGS**
The Mini-Cog had the highest sensitivity (99%), compared to CASI (92%) and MMSE (91%). CASI had the greatest specificity (96%) compared to Mini-Cog (93%) and MMSE (92%). Concordance between naïve and trained raters was >98% for normal, moderately and severely impaired clock drawings. Concordance dropped to 60% in mildly impaired clock drawings but assuming naive raters would score mildly impaired clocks as normal changed the Mini-Cog sensitivity and specificity little (97% and 95%).

**CONCLUSIONS**
The Mini-Cog is a time-efficient, sensitive and specific tool that effectively identifies patients with probably dementia, even with naïve raters.

**LIMITATIONS**
These studies were conducted on a memory clinic population that has a greater incidence of dementia than the community. The population screened by an internist would have a lower incidence of dementia, increasing false positives and lowering specificity.

**IMPACT ON INTERNAL MEDICINE**
The Mini-Cog provides an effective first-stage screening tool for detecting dementia. Naïve raters preformed essentially as well as experts. This evidence supports the nurse or some other health professional administering the Mini-Cog in the busy internist’s office practice. The clock face drawing task requires adequate functioning in the temperoparietal and frontal cortical areas, areas commonly affected in dementias but not fully tested with the MMSE. By combining the sensitive and specific 3-item recall with CDT into the Mini-Cog, the internist has a valuable and easily administered alternative to the MMSE. Combining this first-stage screening with a second stage caregiver brief interview warrants further population-based testing.