The old dog is learning new tricks in the fight against Alzherimer's

While we wait for the medical breakthroughs to improve dementia and Alzheimer's, other researchers are already discovering cognitive skills improvement in older adults.

Professor, Elizabeth Stine-Morrow, of the University of Illinois Educational Psychology and Beckman Institute and associate Psychology professor, Brent Roberts devised a study to see if cognitive abilities could be improved. Participants were tested before and after being given training and a series of tasks composed of "pattern recognition, , problem solving and puzzles" to complete.

Each week participants received a more challenging set of tasks to be completed at home. The average age of participants was 75 (age 60 to 94). When they returned for final testing, they **showed greater improvement in problem solving skills and pattern recognition than a control group** not given any challenging tasks.

However, an unexpected result showed that an aspect of personality changed. Participants who improved in inductive reasoning skills also demonstrated more "openness"

Why would having more "openness" be significant?

According to Stine-Morrow, the traits of personality are assumed to be set in adults between 20 and 30 years-old. To have adults two to three times that age show a personality change is significant.

Of the five personality traits: agreeableness, conscientiousness, neruoticism (mental disturbances), extroversion and openness, "openness" is the only personality trait that is tied to one's mental skills and abilities.

Openness appears to be stimulated by challenging intellectual activity

when coupled with a growth in skills. The interpretation is that when individuals become more open they gain confidence from new challenges and experiences. It also increases creativity for new ideas and greater expression.

These results suggest that the mental skills of adults can no longer be assumed to be on a trajectory for decline. Not only is there a non-drug intervention that can improve skills but a personality trait thought to be fixed in stone is no longer true in this case.

In simple terms it means that "the old dog is learning new tricks." And, if that's the case our brain are less ridged and more flexible that we thought.