Most elderly respondents in HRS preserve good cognitive abilities during their retirement ages (50 years old and onward), especially in the memory abilities. These abilities support them to pursue careers with high complexities. We found that STEM professionals, sales, and business managerial roles achieved the best performance in the overall memory scores, as compared to the retirement control; they also exhibited median to high memory retention while they aged. As their tasks require them to learn new information and solve complex problems, the task complexity can create an cognitively challenging and stimulating environment, their levels of mental exercise increase. Especially for business and sales, managing relationships with stakeholders takes the essential part in their responsibilities, and better social relationships are associated with better cognitive performance. Conversely, skill trades, manual workers, farming, fishery and forestry do not exhibited the same level of memory performance, this could due to more repetitive tasks and less social connections required in their duties.