education (40%) and referrals. Scans stimulated referrals to develop a family plan of progressive support in 27% and to a psychiatrist in 20%. The most frequent change in care practices was referral to a Alzheimer clinical trial (53%). The diagnosis judged most likely before the scan changed in 27% and there was a 90% increase in diagnostic confidence after the amyloid PET. **Conclusions:** The classification of Alzheimer's pathology with amyloid PET frequently changes provider recommendations that depend upon a specific diagnosis. Changes in recommended non-drug care practices contribute to the value of amyloid PET. Further experience is needed to fully understand the role of amyloid classification technology in clinical practice.

IC-P-008 PREDICTION OF AMYLOID POSITIVITY WITH DEMOGRAPHIC, APOE AND NEUROPSYCHOLOGICAL INFORMATION IN COGNITIVELY NORMAL OLD ADULTS WITH SUBJECTIVE COGNITIVE DECLINE

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Background: There are evidences that subjectively experienced cognitive decline even at the stage of normal performance on cognitive tests is associated with an increased risk for future cognitive decline and Alzheimer's disease (AD) dementia. However, subjective cognitive decline (SCD) is unspecific, and related to various medical, psychiatric, and even cultural conditions. For the purpose of early detection of AD, therefore, identifying the characteristics of SCD at the preclinical stage of AD is very important. We aimed to elucidate the demographic, clinical, neuropsychological, and genetic characteristics associated with beta-amyloid (Aβ) deposition, and to search the best prediction model for Aβ positivity in cognitively normal (CN) adults with SCD. **Methods:** One-hundred thirty two CN elderly with SCD were recruited from the Korean Brain Aging Study for Early Diagnosis and Prediction of Alzheimer's Disease (KBASE). The presence of SCD was defined by the answer for a single question: "Do you feel that your cognitive function has declined compared to past?" All the subjects received comprehensive clinical and neuropsychological assessments, apolipoprotein E (APOE) genotyping, ^{11}C-labelled Pittsburgh Compound B (PiB) –PET imaging. Aβ positivity was determined if the SUVR value was > 1.4 in at least one of the four ROIs **Results:** Univariate analyses showed that Aβ positive group was older and had more APOE e4 carrier than Aβ negative group. In regard of neuropsychological performance, Aβ positive subjects had higher phonemic fluency score than Aβ negative ones. A series of multiple logistic regression analyses showed that the model including age, APOE genotype, and phonemic fluency score together had best predictive ability for Aβ positivity in CN subjects with SCD (prediction accuracy: 87.1%), although the models with each of the three variables or any two of them significantly predict Aβ positivity as well (accuracy: 81.8∼85.6%). **Conclusions:** Our findings suggest that older age, the presence of APOE e4 allele, and higher phonemic fluency increase the likelihood of preclinical AD in cognitively healthy old adults with subjective cognitive complaint. Higher phonemic fluency may be related to compensatory brain activation for Aβ pathology.

Table 2
Finally Selected Logistic Regression Model (model CNG)* for Amyloid positivity Prediction in SCD(+)

Variables	Regression Coefficient	Standard Error	Odd ratios	95% Confidence Interval	*p*
Intercept	-16.44	3.59	0.00		<0.001
Age	0.16	0.04	1.18	1.08-1.28	<0.001
Phonemic fluency	0.09	0.02	1.09	1.04-1.15	<0.001
ApoE4+	2.12	0.64	8.32	2.38-29.04	0.001

Abbreviations: Apo E4+, apolipoprotein ε4 carrier; SCD, subjective cognitive decline.

IC-P-009 OBSTRUCTIVE SLEEP APNEA IS ASSOCIATED WITH LONGITUDINAL INCREASES IN AMYLOID BURDEN IN ELDERLY MILD COGNITIVE IMPAIRMENT INDIVIDUALS

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Table 1
Results Obtained From Logistic Regression Analyses Designed to Select Appropriate Models for Amyloid positivity prediction in SCD(+)

Models	-2LL	χ^2	df	*p*	Diagnostic Accuracy (%)	Significance test for -2LL Difference
One-candidate model						
Model C Age	103.72	15.22	1	<0.001	81.8	
Model S Age at onset of SCD	107.07	11.88	1	0.001		
Model N Phonemic fluency	112.23	6.72	1	0.01	83.3	
Model G APOE4+	110.46	8.49	1	0.003	83.3	
Two-candidate model						
Model CN Age+ Phonemic fluency	92.44	26.51	2	<0.001	84.1	Model CN versus C: p=0.001 Model CN versus N: p=<0.001
Model CG Age+ APOE4+	95.64	23.31	2	<0.001	85.6	Model CG versus C: p=0.004 Model CG versus G: p=<0.001
Model NG Phonemic fluency+ APOE4+	101.22	17.73	2	<0.001	83.3	Model NG versus N: p=0.001 Model NG versus G: p=0.004
Three-candidate model						
Model CNG Age+ Phonemic fluency+ APOE4+	80.97	37.98	3	<0.001	87.1	Model CNG versus CN: p=0.001

Abbreviations: Apo E4+, apolipoprotein ε4 carrier; SCD, subjective cognitive decline.