

Supplementary Table 1. Mean \pm standard deviation of the grand average P3 peak amplitude of CNA $\beta+$ and CNA $\beta-$ at Fz/Cz/Pz across testing conditions

Variables	CNA $\beta+$ (n= 17) Mean \pm Std. Dev.	CNA $\beta-$ (n = 17) Mean \pm Std. Dev.	
Fz Amplitude (μ V)			
0-back	Nontarget Target Difference	2.068 \pm 3.312 4.374 \pm 3.701 -0.437 \pm 2.447	4.156 \pm 3.124 5.302 \pm 3.825 3.616 \pm 2.471
1-back	Nontarget Target Difference	3.248 \pm 4.574 3.758 \pm 4.620 1.043 \pm 2.187	4.748 \pm 8.184 2.962 \pm 4.370 3.170 \pm 6.262
2-back	Nontarget Target Difference	2.686 \pm 2.211 3.914 \pm 3.309 0.537 \pm 1.592	3.669 \pm 6.709 2.358 \pm 2.694 1.851 \pm 5.785
Cz Amplitude (μ V)			
0-back	Nontarget Target Difference	2.424 \pm 1.990 2.325 \pm 2.980 0.484 \pm 2.931	4.416 \pm 7.628 3.018 \pm 1.452 1.887 \pm 6.130
1-back	Nontarget Target Difference	2.794 \pm 2.187 2.405 \pm 3.056 1.078 \pm 2.931	2.978 \pm 2.126 2.264 \pm 2.208 1.887 \pm 5.785
2-back	Nontarget Target Difference	1.762 \pm 1.508 2.475 \pm 2.574 0.314 \pm 1.464	1.926 \pm 6.730 1.821 \pm 4.806 0.726 \pm 2.282
Pz Amplitude (μ V)			
0-back	Nontarget Target Difference	1.246 1.709 2.646 \pm 1.766 0.333 \pm 2.266	1.364 \pm 1.362 3.493 \pm 3.123 0.589 \pm 2.100
1-back	Nontarget Target Difference	2.035 \pm 2.657 2.410 \pm 2.540 0.499 \pm 1.909	1.958 \pm 1.571 3.068 \pm 2.747 0.409 \pm 1.401
2-back	Nontarget Target Difference	1.093 \pm 1.9656 1.021 \pm 2.130 0.824 \pm 1.621	2.144 \pm 2.281 2.226 \pm 2.121 0.733 \pm 1.178

Abbreviations: CNA β , cognitively normal, beta-amyloid

Supplementary Table 2. Peak P3 latency at Fz/Cz/Pz across testing conditions of CNA β + and CNA β -

Variables		CNA β + Mean \pm Std. Dev.	CNA β - Mean \pm Std. Dev.
Fz Latency (ms)			
0-back	Nontarget	418 \pm 82	461 \pm 80
	Target	399 \pm 91	405 \pm 98
	Difference	497 \pm 83	470 \pm 84
1-back	Nontarget	415 \pm 81	461 \pm 80
	Target	401 \pm 90	403 \pm 100
	Difference	491 \pm 85	469 \pm 84
2-back	Nontarget	418 \pm 79	463 \pm 81
	Target	404 \pm 92	403 \pm 100
	Difference	490 \pm 86	476 \pm 78
Cz Latency (ms)			
0-back	Nontarget	420 \pm 86	455 \pm 89
	Target	409 \pm 86	431 \pm 89
	Difference	476 \pm 99	438 \pm 104
1-back	Nontarget	416 \pm 85	452 \pm 93
	Target	413 \pm 86	429 \pm 89
	Difference	472 \pm 98	443 \pm 103
2-back	Nontarget	418 \pm 84	458 \pm 90
	Target	417 \pm 90	426 \pm 92
	Difference	471 \pm 98	450 \pm 101
Pz Latency (ms)			
0-back	Nontarget	380 \pm 108	404 \pm 114
	Target	408 \pm 82	404 \pm 93
	Difference	421 \pm 122	387 \pm 112
1-back	Nontarget	379 \pm 105	404 \pm 113
	Target	406 \pm 83	403 \pm 93
	Difference	421 \pm 122	391 \pm 115
2-back	Nontarget	377 \pm 106	411 \pm 115
	Target	410 \pm 84	405 \pm 95
	Difference	415 \pm 121	400 \pm 118

Abbreviations: CNA β , cognitively normal, beta-amyloid

Supplementary Table 3. Event-related power ($\mu\text{V}/\text{Hz}^2$) of CNA $\beta+$ ($n = 17$) and CNA $\beta-$ ($n = 17$) at Fz/Cz/Pz, across testing conditions. (Mean \pm Std. Dev.)

		Fz Channel		Cz Channel		Pz Channel	
		CNA $\beta+$	CNA $\beta-$	CNA $\beta+$	CNA $\beta-$	CNA $\beta+$	CNA $\beta-$
Delta Band							
0-back	Nontarget	0.443 \pm 0.455	1.916 \pm 3.681	0.328 \pm 0.322	0.601 \pm 1.111	0.086 \pm 0.132	0.096 \pm 0.153
	Target	0.371 \pm 0.328	3.763 \pm 3.979	0.285 \pm 0.305	1.519 \pm 5.064	0.207 \pm 0.289	0.319 \pm 0.799
	Difference	0.397 \pm 0.390	-1.288 \pm 1.392	0.129 \pm 0.131	-0.800 \pm 4.018	0.128 \pm 0.215	-0.043 \pm 0.709
1-back	Nontarget	0.600 \pm 0.787	1.343 \pm 2.841	0.289 \pm 0.352	0.273 \pm 0.217	0.078 \pm 0.081	0.069 \pm 0.086
	Target	0.593 \pm 1.206	0.359 \pm 0.464	0.167 \pm 0.158	0.199 \pm 0.189	0.140 \pm 0.174	0.142 \pm 0.237
	Difference	0.526 \pm 0.937	1.455 \pm 3.763	0.150 \pm 0.224	0.116 \pm 0.149	0.124 \pm 0.164	0.073 \pm 0.100
2-back	Nontarget	0.309 \pm 0.286	2.217 \pm 6.668	0.213 \pm 0.308	0.364 \pm 0.718	0.059 \pm 0.091	0.087 \pm 0.105
	Target	0.413 \pm 0.580	0.797 \pm 2.353	0.245 \pm 0.449	0.223 \pm 0.381	0.100 \pm 0.176	0.059 \pm 0.064
	Difference	0.215 \pm 0.314	1.518 \pm 4.346	0.072 \pm 0.082	0.135 \pm 0.334	0.046 \pm 0.073	0.034 \pm 0.059
Theta Band							
0-back	Nontarget	0.168 \pm 0.145	0.208 \pm 0.202	0.117 \pm 0.167	0.102 \pm 0.095	0.039 \pm 0.081	0.022 \pm 0.026
	Target	0.145 \pm 0.096	0.278 \pm 0.539	0.107 \pm 0.133	0.126 \pm 0.206	0.051 \pm 0.088	0.033 \pm 0.046
	Difference	0.085 \pm 0.073	-0.006 \pm 0.368	0.050 \pm 0.064	0.001 \pm 0.130	0.035 \pm 0.048	0.007 \pm 0.027
1-back	Nontarget	0.236 \pm 0.230	0.167 \pm 0.096	0.150 \pm 0.204	0.085 \pm 0.052	0.049 \pm 0.089	0.023 \pm 0.026
	Target	0.182 \pm 0.136	0.151 \pm 0.155	0.128 \pm 0.167	0.079 \pm 0.048	0.051 \pm 0.089	0.030 \pm 0.038
	Difference	0.125 \pm 0.264	0.081 \pm 0.122	0.040 \pm 0.057	0.027 \pm 0.019	0.027 \pm 0.048	0.018 \pm 0.024
2-back	Nontarget	0.203 \pm 0.193	0.222 \pm 0.391	0.148 \pm 0.196	0.072 \pm 0.059	0.055 \pm 0.114	0.016 \pm 0.018
	Target	0.185 \pm 0.166	0.189 \pm 0.351	0.140 \pm 0.179	0.062 \pm 0.052	0.054 \pm 0.104	0.020 \pm 0.023
	Difference	0.050 \pm 0.069	0.052 \pm 0.063	0.035 \pm 0.062	0.015 \pm 0.012	0.017 \pm 0.021	0.009 \pm 0.011

Alpha Band							
0-back	Nontarget	0.050 ± 0.041	0.052 ± 0.054	0.034 ± 0.037	0.029 ± 0.031	0.018 ± 0.032	0.008 ± 0.009
	Target	0.085 ± 0.070	0.083 ± 0.089	0.061 ± 0.075	0.046 ± 0.047	0.025 ± 0.038	0.013 ± 0.017
	Difference	0.039 ± 0.034	0.017 ± 0.053	0.031 ± 0.037	0.011 ± 0.030	0.018 ± 0.031	0.009 ± 0.020
	Nontarget	0.059 ± 0.045	0.046 ± 0.036	0.045 ± 0.052	0.026 ± 0.019	0.016 ± 0.024	0.008 ± 0.008
	Target	0.075 ± 0.070	0.060 ± 0.051	0.056 ± 0.076	0.035 ± 0.024	0.024 ± 0.045	0.012 ± 0.012
	Difference	0.028 ± 0.022	0.030 ± 0.033	0.019 ± 0.024	0.016 ± 0.017	0.010 ± 0.015	0.007 ± 0.005
1-back	Nontarget	0.055 ± 0.056	0.039 ± 0.024	0.045 ± 0.061	0.022 ± 0.016	0.019 ± 0.036	0.006 ± 0.007
	Target	0.084 ± 0.091	0.048 ± 0.034	0.065 ± 0.084	0.026 ± 0.018	0.023 ± 0.037	0.013 ± 0.017
	Difference	0.034 ± 0.049	0.015 ± 0.022	0.019 ± 0.028	0.008 ± 0.009	0.008 ± 0.010	0.009 ± 0.016
Beta Band							
0-back	Nontarget	0.006 ± 0.007	0.007 ± 0.007	0.004 ± 0.006	0.003 ± 0.003	0.002 ± 0.002	0.001 ± 0.001
	Target	0.009 ± 0.007	0.014 ± 0.015	0.005 ± 0.006	0.006 ± 0.006	0.002 ± 0.002	0.003 ± 0.003
	Difference	0.009 ± 0.007	0.010 ± 0.015	0.006 ± 0.006	0.004 ± 0.006	0.003 ± 0.002	0.003 ± 0.005
1-back	Nontarget	0.006 ± 0.004	0.005 ± 0.003	0.004 ± 0.004	0.003 ± 0.002	0.002 ± 0.003	0.002 ± 0.001
	Target	0.009 ± 0.008	0.008 ± 0.005	0.005 ± 0.005	0.004 ± 0.003	0.003 ± 0.004	0.002 ± 0.002
	Difference	0.009 ± 0.009	0.009 ± 0.007	0.006 ± 0.007	0.005 ± 0.004	0.003 ± 0.003	0.003 ± 0.002
2-back	Nontarget	0.006 ± 0.004	0.005 ± 0.003	0.004 ± 0.004	0.003 ± 0.002	0.002 ± 0.002	0.002 ± 0.001
	Target	0.012 ± 0.016	0.008 ± 0.006	0.007 ± 0.012	0.004 ± 0.002	0.004 ± 0.005	0.003 ± 0.003
	Difference	0.013 ± 0.019	0.007 ± 0.008	0.008 ± 0.016	0.004 ± 0.004	0.004 ± 0.005	0.003 ± 0.004