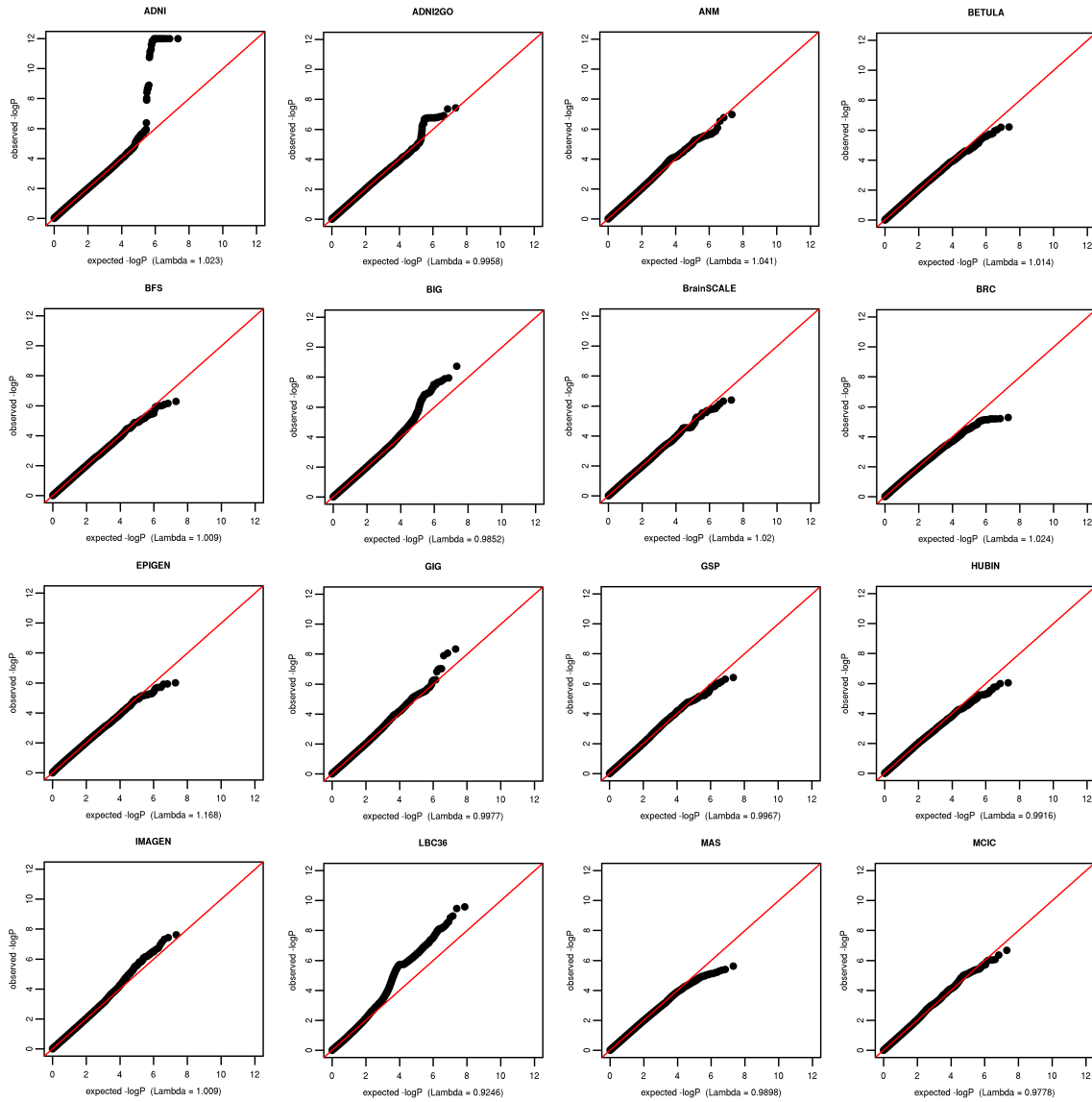
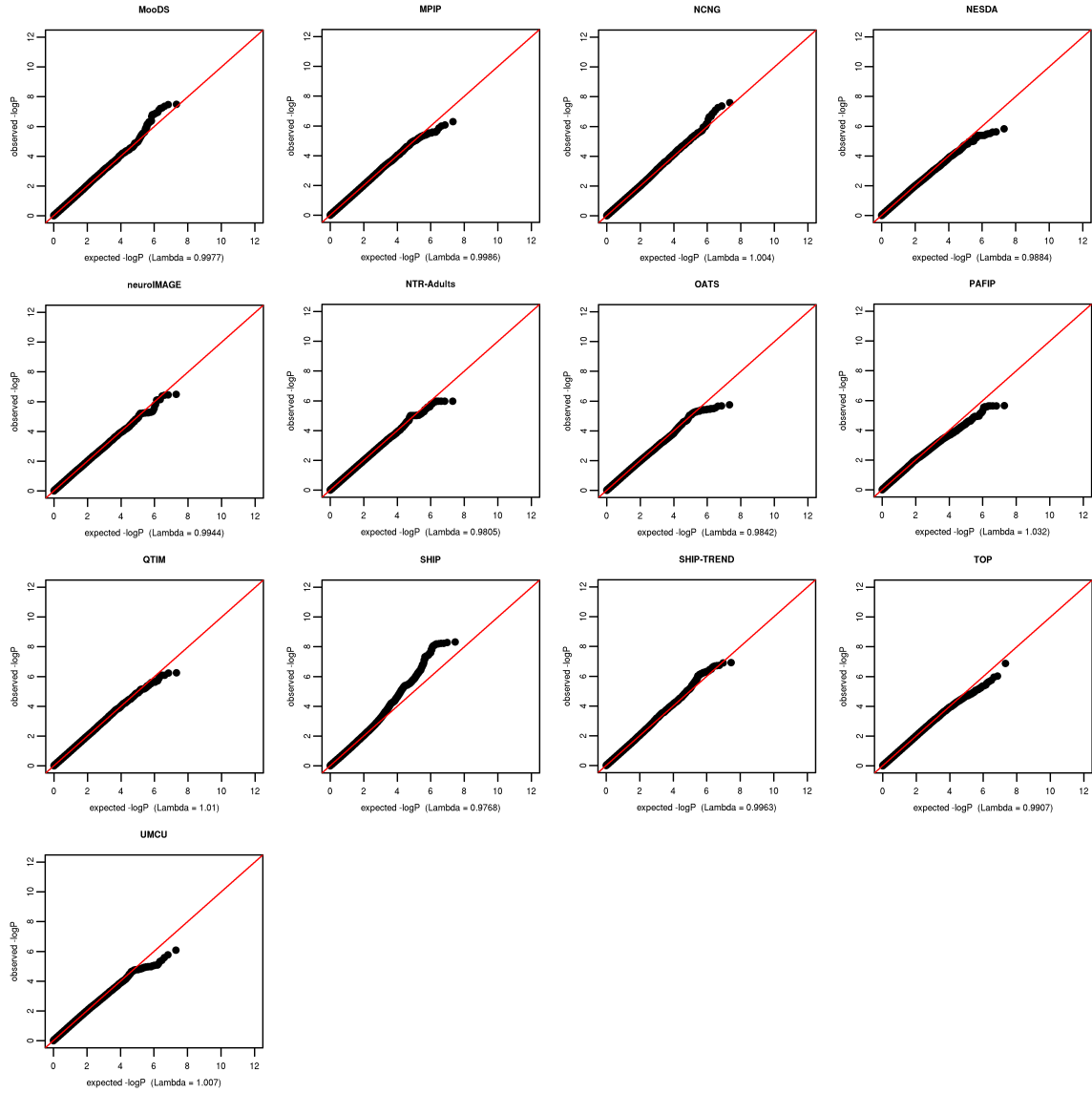


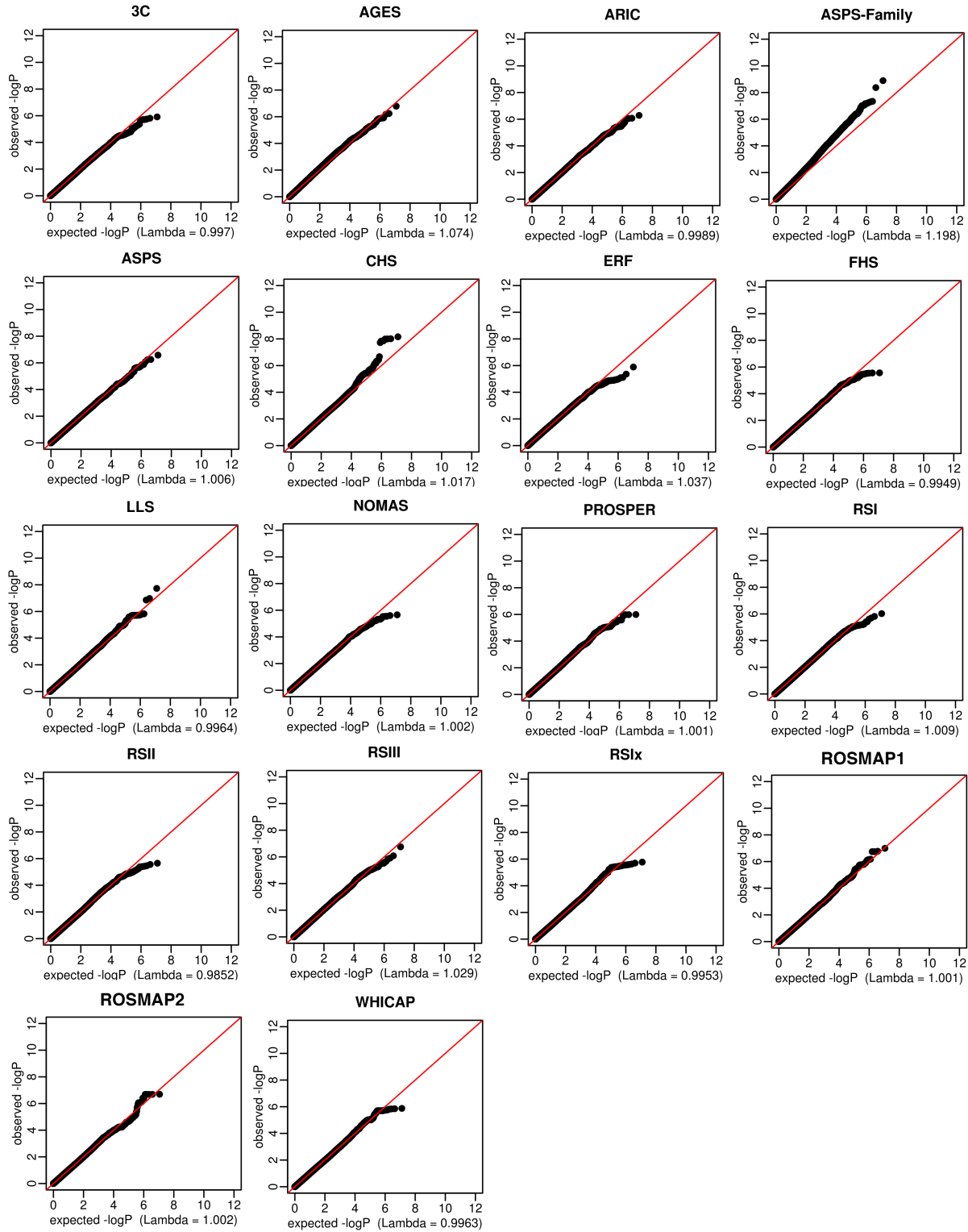
**Supplemental Figure 1 (a-b).** (a) Quantile-Quantile plots of the GWAS of hippocampal volume results for each individual study from the ENIGMA Consortium (split into two panels a and b). Lambda inflation factors are provided for each plot. The red line represents the expected null distribution.



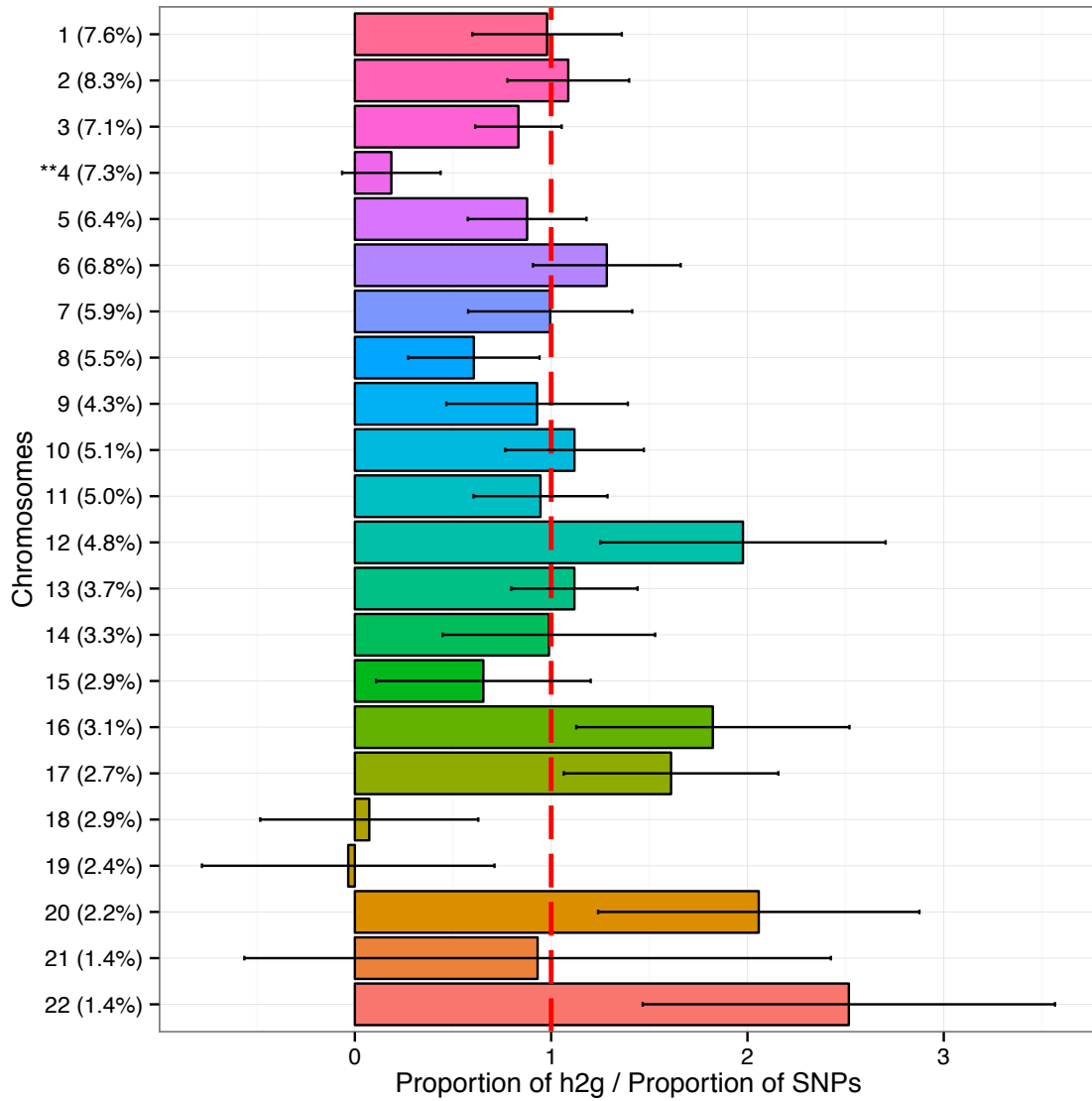
**Supplemental Figure 1 (a-b).** (b) Quantile-Quantile plots of the GWAS of hippocampal volume results for each individual study from the ENIGMA Consortium (split into two panels a and b). Lambda inflation factors are provided for each plot. The red line represents the expected null distribution.



**Supplemental Figure 2.** (b) Quantile-Quantile plots of the GWAS of hippocampal volume results for each individual study from the CHARGE Consortium. Lambda inflation factors are provided for each plot. The red line represents the expected null distribution.



**Supplemental Figure 3.** LDSC regression analysis split by chromosome. Plotted values are the proportion of  $h^2_g$  explained divided by the proportion of SNPs in a given chromosome. Values are significantly over- or under-represented if they differ significantly from 1. Values are plotted with a standard error calculated with a jackknife in LDSC. Chromosome 4 had a significant under-representation in its contribution to the overall heritability estimate (indicated by \*\*).



## Supplementary Note 1: Consortium Authors:

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Data used in preparing this article were obtained from the Alzheimer's Disease Neuroimaging Initiative (ADNI) database ([adni.loni.usc.edu](http://adni.loni.usc.edu)). As such, many investigators within the ADNI contributed to the design and implementation of ADNI and/or provided data but did not participate in analysis or writing of this report. A complete listing of ADNI investigators can be found at: [http://adni.loni.usc.edu/wp-content/uploads/how\\_to\\_apply/ADNI\\_Acknowledgement\\_List.pdf](http://adni.loni.usc.edu/wp-content/uploads/how_to_apply/ADNI_Acknowledgement_List.pdf)

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#### **ADNI Methods:**

Data used in the preparation of this article were obtained from the Alzheimer's Disease Neuroimaging Initiative (ADNI) database ([adni.loni.usc.edu](http://adni.loni.usc.edu)). The ADNI was launched in 2003 by the National Institute on Aging (NIA), the National Institute of Biomedical Imaging and Bioengineering (NIBIB), the Food and Drug Administration (FDA), private pharmaceutical companies and non-profit organizations, as a \$60 million, 5-year public-private partnership. The primary goal of ADNI has been to test whether serial magnetic resonance imaging (MRI), positron emission tomography (PET), other biological markers, and clinical and neuropsychological assessment can be combined to measure the progression of mild cognitive impairment (MCI) and early Alzheimer's disease (AD). Determination of sensitive and specific markers of very early AD progression is intended to aid researchers and clinicians to develop new treatments and monitor their effectiveness, as well as lessen the time and cost of clinical trials.

The Principal Investigator of this initiative is Michael W. Weiner, MD, VA Medical Center and

University of California – San Francisco. ADNI is the result of efforts of many co-investigators from a broad range of academic institutions and private corporations, and subjects have been recruited from over 50 sites across the U.S. and Canada. The initial goal of ADNI was to recruit 800 subjects but ADNI has been followed by ADNI-GO and ADNI-2. To date these three protocols have recruited over 1500 adults, ages 55 to 90, to participate in the research, consisting of cognitively normal older individuals, people with early or late MCI, and people with early AD. The follow up duration of each group is specified in the protocols for ADNI-1, ADNI-2 and ADNI-GO. Subjects originally recruited for ADNI-1 and ADNI-GO had the option to be followed in ADNI-2. For up-to-date information, see [www.adni-info.org](http://www.adni-info.org).

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