SUPPLEMENTARY INFORMATION

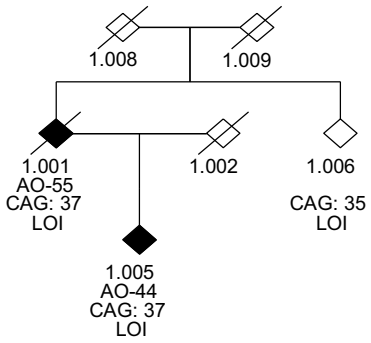
Length of uninterrupted CAG repeats, independent of polyglutamine size, results in increased somatic instability and hastened age of onset in Huntington disease

Galen E.B. Wright[1]; Jennifer A. Collins[1]; Chris Kay[1]; Cassandra McDonald[1]; Egor Dolzhenko[2]; Qingwen Xia[1]; Kristina Bečanović[1,3]; Alicia Semaka[4]; Charlotte M. Nguyen[5,6]; Brett Trost[5]; Fiona Richards[7]; Emilia K. Bijlsma[8]; Ferdinando Squitieri[9]; Stephen W. Scherer[5,6,10]; Michael A. Eberle[2]; Ryan K.C. Yuen[5,6]; Michael R. Hayden[1*]

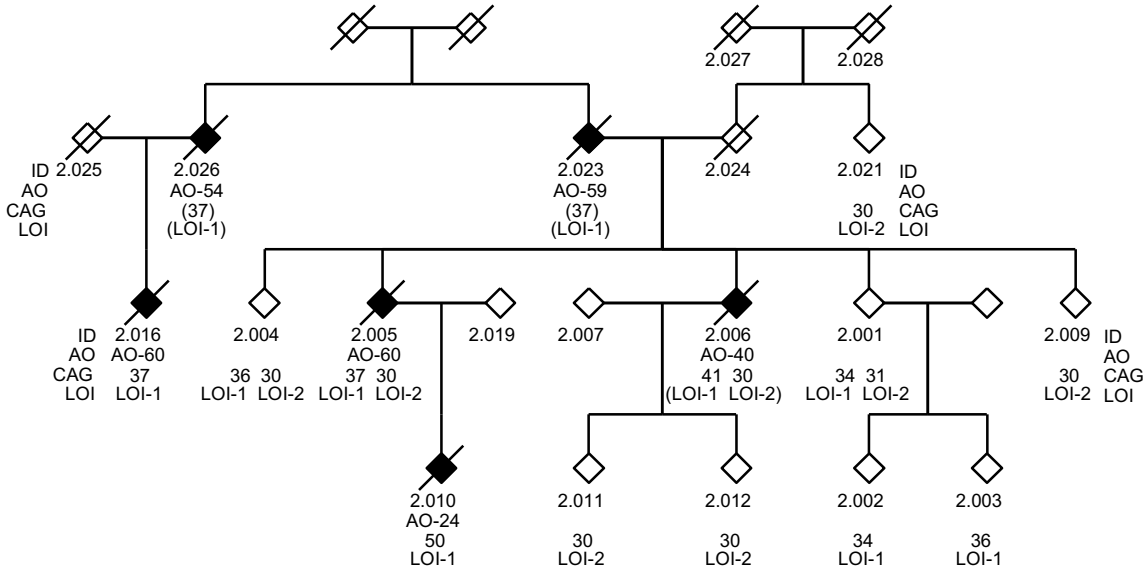
[1]Centre for Molecular Medicine Therapeutics, Department of Medical Genetics, University of British Columbia, Vancouver, BC, Canada; [2]Illumina Inc, San Diego, California, USA; [3]Department of Clinical Neuroscience, Karolinska Institutet, Stockholm, Sweden; [4]Department of Psychiatry, University of British Columbia, Vancouver, BC, Canada; [5]The Hospital For Sick Children, The Centre for Applied Genomics, Genetics and Genome Biology; [6]University of Toronto, Department of Molecular Genetics; [7]Department of Clinical Genetics, Children's Hospital at Westmead; [8]Department of Clinical Genetics, Leiden University Medical Center, Leiden, the Netherlands; [9]Huntington and Rare Diseases Unit, Fondazione IRCCS Casa Sollievo della Sofferenza, San Giovanni Rotondo, Italy; [10]McLaughlin Centre, University of Toronto.

Supplementary Figure S1 HD loss of interruption (LOI) patient pedigrees included in the current study (*n*=6). Affection status, CAG sizes, age of onset information and LOI genotype are indicated

HD-LOI-01



HD-LOI-02



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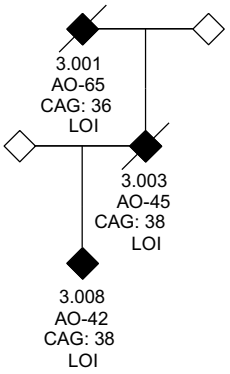

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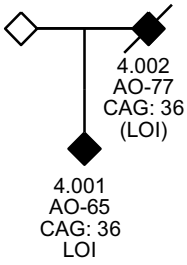

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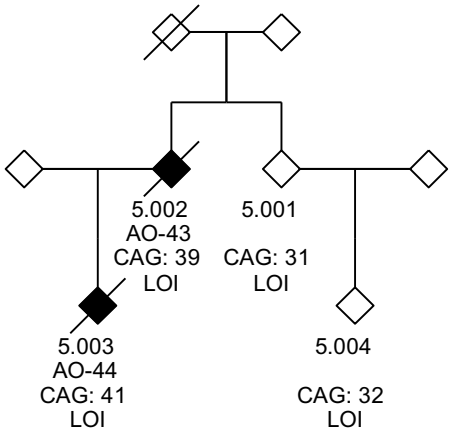
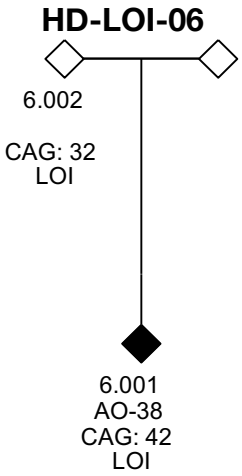
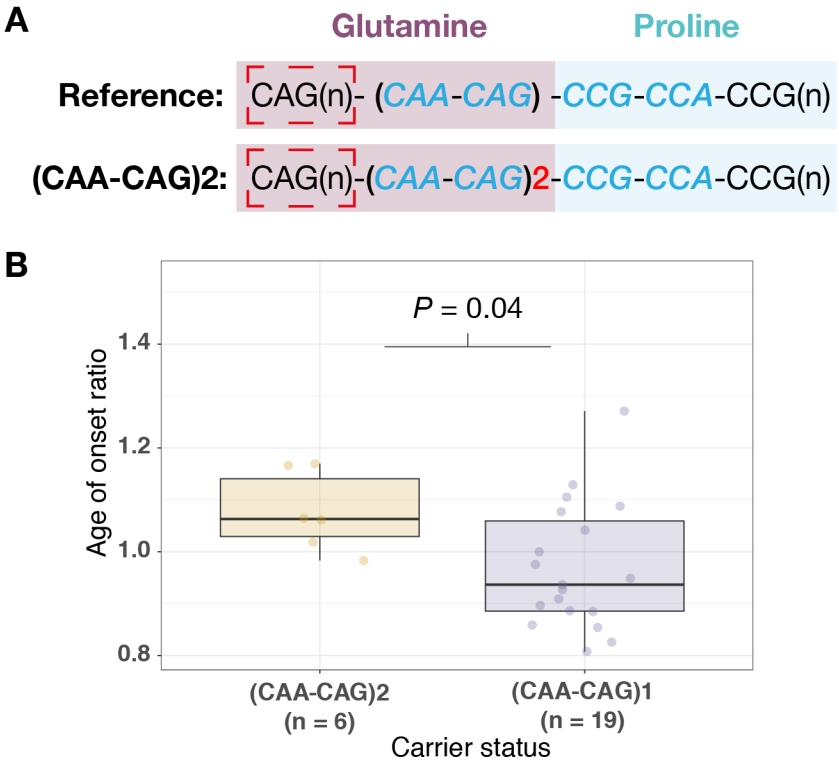



HD-LOI-06
6.002
CAG: 32
LOI
6.001
AO-38
CAG: 42
LOI



Supplementary Figure S2. An interrupting sequence variant that results in an additional CAA-CAG repeat is associated with a later age of onset in HD patients. (A) The reference *HTT* CAG-CCG interrupting sequence in relation to the $(CAA\text{-}CAG)_2$ variant. The dashed red box indicates the CAG repeat that is measured in diagnostic assays for HD. Nucleotides encoding the glutamine (i.e., CAG/CAA) and proline (i.e., CCG/CCA) tracts are shaded. **(B)** The $(CAA\text{-}CAG)_2$ variant is associated with later age of onset (AOO) as determined by the AOO ratio in HD subjects compared to HD subjects with the reference interrupting sequence (n=19). $(CAA\text{-}CAG)_2$ carriers present on average 4.8 years later than the majority of HD patients with the reference CAG repeat interruption.