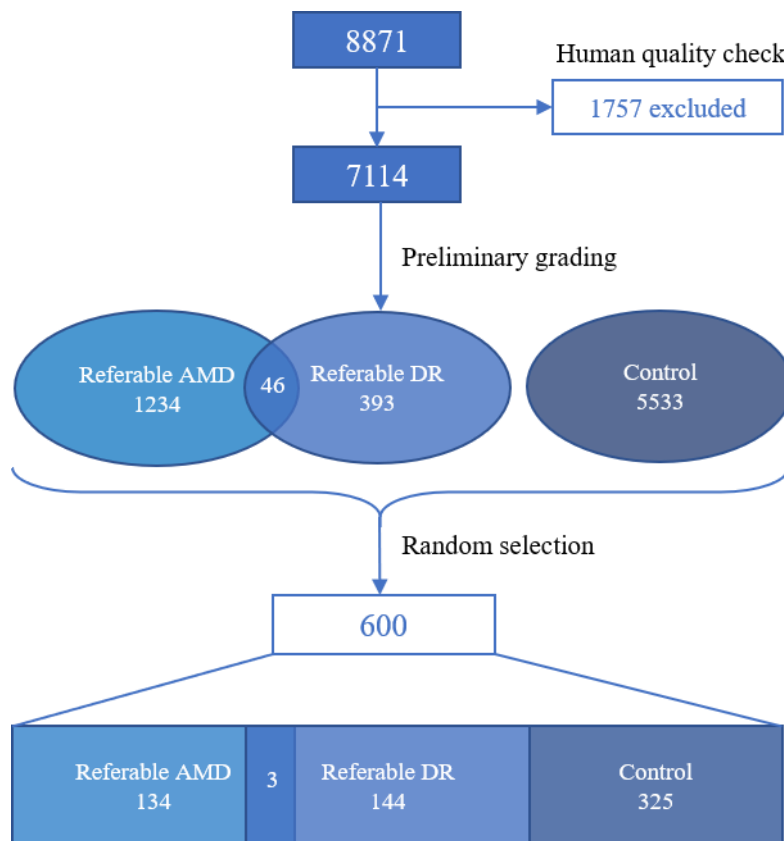


Figure S1. Extraction of the DR-AMD dataset.



The DR-AMD dataset was extracted from a set of 8871 images from more than 2000 patients collected in three different European medical centers (Sweden, Denmark, Spain) during routine clinical practice. Images went through a human quality check, regarding contrast, clarity and focus, where 1757 images were excluded. The remaining 7114 images went through a preliminary grading, performed by a person with over six years of experience reading CF images. Images were classified as referable AMD (1234 images), referable DR (393 images) or control (5533 images), which indicates non-referability for both DR and AMD, although other diseases might be present; 46 images were graded as having both referable AMD and DR present. Lastly, a random selection of 600 images was performed, containing 325 controls, 134 referable AMD cases and 144 referable DR cases (3 images with both referable AMD and DR). These images belong to 288 different patients, with an average of 2.11 images and 1.18 visits per patient. The 600 images define the DR-AMD set used for validation of joint detection of DR and AMD. The remaining gradable images were used for system development, excluding those which belonged to patients included in the DR-AMD dataset.

Abbreviations: CF, Color fundus; DR, Diabetic retinopathy; AMD, Age-related macular degeneration.