



FIGURE 25.23. A portion of the Y chromosome does not recombine. (A) Human chromosomes showing an example of the X chromosome (*blue*) and the Y chromosome (*pink*). A long stretch of the Y-chromosome DNA sequence shares a single genealogical history, so the many mutations that have occurred throughout the sequence help to reveal the single genealogy. (B) A portion of the genealogy of the Y chromosome, based on a large number of mutations that occur sufficiently infrequently in human evolution that they can be considered effectively unique.

25.23, illustration, adapted from Underhill P.A. et al., *Nat. Genet.* **26**: 358–361, © 2000 Macmillan, www.nature.com