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Two monic irreducible polynomials over  $\mathbf{F}_q$  with  $q > 2$  are called *twins* provided they differ only in their constant coefficient. It has been proven that for all  $q > 2$  there exist infinitely many twin irreducible pairs over  $\mathbf{F}_q$ . Over  $\mathbf{F}_2$ , however, twins must be defined as differing only in their linear and quadratic coefficients (since their constant coefficients must be 1), and so the techniques used to establish the above results for  $q > 2$  do not work. We discuss the background of this distinct and seemingly difficult case. (Received September 20, 2010)