In view of demographic changes and previous research results, it is debatable whether hereditary criteria should be further applied when it comes to determining the status of prostate carcinoma (PC) patients. A total of 30,455 patients in the national research program "Familial Prostate Carcinoma" were divided into four groups based on birth year: I: 1920-1929 (n = 3,968), II: 1930-1939 (n = 14,110), III: 1940-1949 (n = 10,137), IV: 1950-1959 (n = 2,169). In all, 9,316 PC patients with a positive family history were analyzed with respect to their relatives (first degree). The average number of siblings (group I: 3.3; IV: 2.2), brothers (I: 2.1; IV: 1.3), children (I: 2.2; IV: 1.7), and sons (I: 1.1; IV: 0.9) have decreased. The number of patients without a brother/son (I: 9.6/32.8%; IV: 27.6/37.5%) has increased. In the same period of time, the number of patients with two brothers/sons (I: 34.5/6.3%; IV: 14.8/2.2 %) has decreased. The number of fathers > 65 years has risen from 66.8% (I) to 71.1% (IV). Hereditary criteria are less and less suited in order to determine the status of PC patients. However, positive family history remains one of the most crucial risk factors of prostate carcinoma and, therefore, detailed data ascertainment should be urged.