

for example, the risks are over 20 times as great if the vehicle's breakup $q\alpha$ is 20,000 rather than 5,000 deg-lb/ft².

6.4 Shaping Constants for Titan IV

Mode-5 shaping constants for Titan IV were developed as described in Section 6.3 for Delta, except that a total of 290,000 simulations were run between the programming time of 18 seconds and staging at 300 seconds. The percentage of vehicles that break up during simulated random-attitude turns are plotted against failure time in Figure 26. The same $q\alpha$'s used with Atlas and Delta were used here, and similar breakup results were obtained.

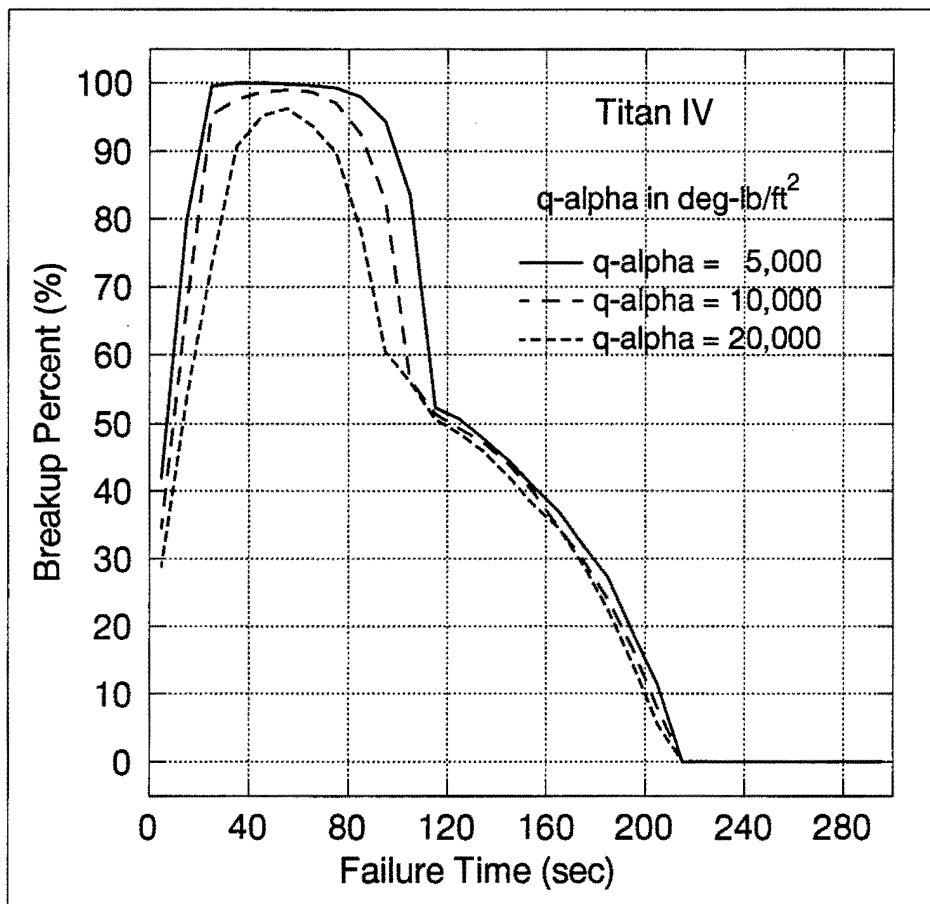


Figure 26. Titan IV Breakup Percentages