

**G3 Modifications  
for two stage  
Sustainer**

Fin Tip cut to reduce twisting moments (flutter)

5-minute epoxy  
JB Weld

5-minute epoxy Fillet  
West Systems Epoxy (Laminations)  
5.08 oz CF Tip-to-Tip  
2 oz FG Tip-to-Tip

JB Weld

Centering Rings

54mm motor mount

JB Weld Fin Root to Motor Mount

Epoxy Free Zone

4-1/2"

1"

6-1/2"

3x 4-40 Nylon Shear Pins

slip fit

Epoxy

slip fit

Separation Charge

3x 4-40 Steel Screws

SlimLine Quik-Lock Retainer

Nozzle

Coupler

Bolts or all-thread

Missileworks PET2 Timer 3.85" x 1.38"

igniter wire

1-1/2 diameter

Coupler Airframe

Coupler Bulkhead Epoxied to Coupler

Upper Booster Airframe Screwed to Coupler

Copper foil traces on exterior of airframe for ignition wiring

Slingshot IV G3-2X  
 Length: 125 5000 In. Diameter: 3.1250 In. Span diameter: 11.1250 In.  
 Mass: 279 9677 Oz. Selected stage mass: 279 9677 Oz. (User specified)  
 CG: 52.7967 In. CP: 93.7157 In. Margin: 13.09 Overstable  
 Engines: [K1050W-None-5, [K1050W-2]

GPS Payload Bay

Sustainer

Booster

Deployment Avbay

Ignition Avbay

Booster Avbay

Main Chute

Drogue Chute

timer

coupler

airframe

chute

shear pins

1 dia

1-1/2 dia

1-1/2 dia

1 dia