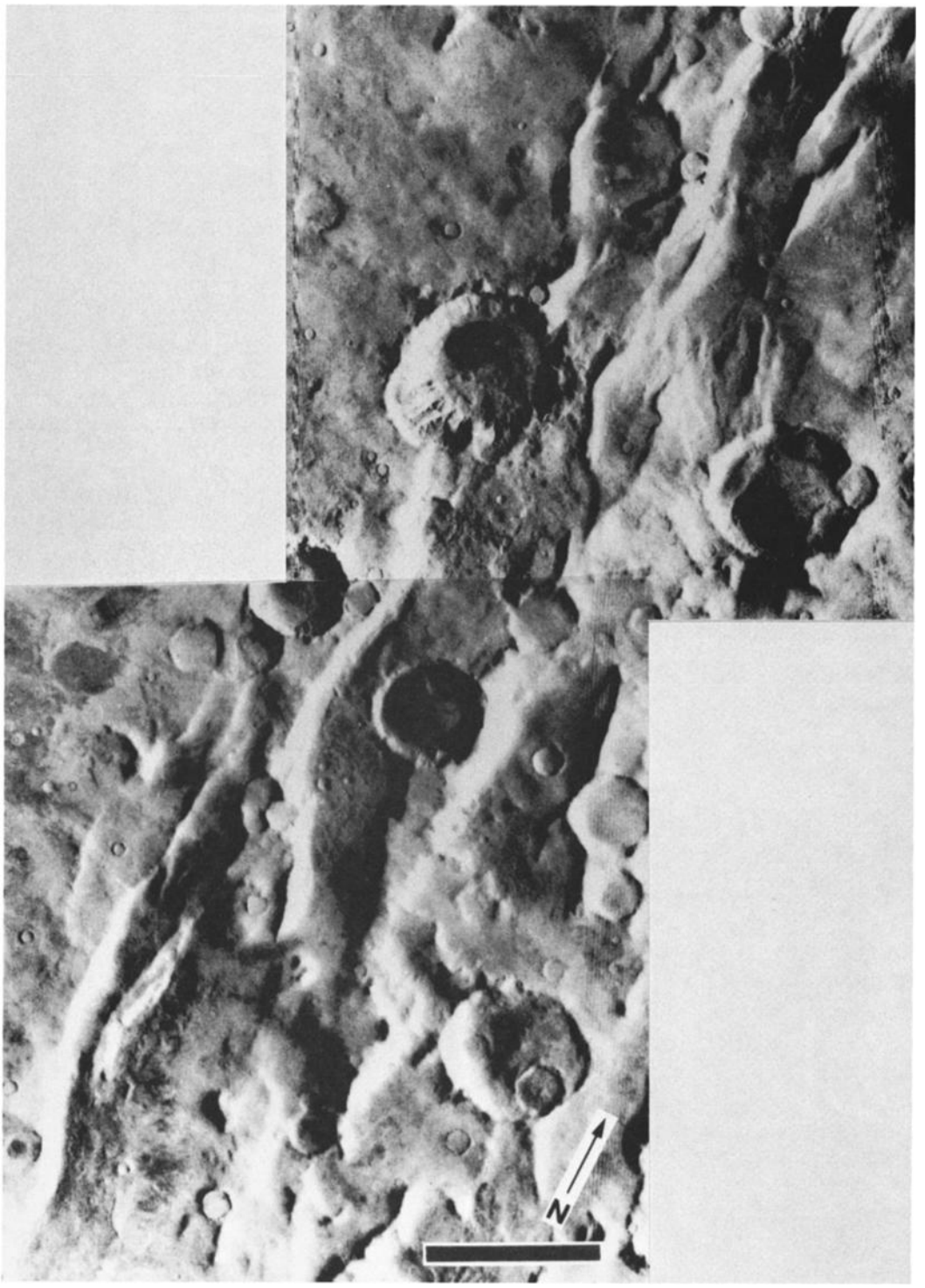

Fig. 3*a*

Fig. 3. Images of the Hellespontes Montes showing fault traces and uplifted horst blocks. (*a*) To the south these structures resemble more typical graben and scarp features than (*b*) in the north, where horst blocks narrow into sharper, ridgelike features. Scale bars are 50 km. (Viking Orbiter images, VO 510A51,52 and VO 584A27–28, respectively).

lated massif ring graben trends (Figure 1). Although *Schaber* [1982] derived a thickness of ~0.5 km for SMP from elevation differences with cratered plains to the west, elevations inside the Isidis basin scarp to the south require average thicknesses of 1–2 km in order to bury the massif ring. Thickness estimates are poorly constrained in MP; however, buried craters and the burial of the massif ring also indicate thicknesses of the order of 1 km.

The Hellas region also contains most of the Martian volcanic constructs outside the Tharsis and Elysium volcanic provinces [*Greeley and Spudis*,