



Figure 39. Highly schematic map showing approximate depth to the M-discontinuity in the Caribbean region. Solid straight line segments represent lines of seismic refraction; small numbers indicate depth to layers of seismic velocity of 7.8 km/sec or greater. Lines without numbers are refraction sites where mantle velocities were not detected. Short-dashed lines indicate areas where gravity models were used to control the contours of depth. Stars indicate crustal determinations from local earthquake data. Depths are in kilometers. Data are from many sources, including: Edgar and others (1971), Officer and others (1957, 1959), Ewing and others (1957, 1960), Hersey and others (1952), Worzel and Ewing (1952), Ewing and Worzel (1954), Uchupi and others (1971), Bowin (1976), Reblin (1973), Arden (1975), Case and others (1971, 1973), Shor and Fisher (1961), Victor (1976), Woodcock (1975), Barday (1974), Polinsbee (1972), Meyer and others (1976), Meissner and others (1976), Bonini and others (1977), Bonini (1978), Couch (1976), Ladd and others (1978), Ibrahim and others (1979), Matumoto and Latham (1977), Matumoto and others (1976), Case and Donnelly (1976), Soloviev and others (1964a), Antoine and Ewing (1963), Martin and Case (1975), Silver and others (1975), Talwani and others (1959), Kim and others (1979), Gettrust and others (1978), Briceño-Guarupe (1978), Dillon and others (1972), and Bunce and Fahlquist (1962).

This report is preliminary and has not been edited or reviewed for conformity with Geological Survey standards and nomenclature.