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Proposed Program for Scientific Drilling in Western Pacific

The Western Pacific Panel of the Ocean Drilling Program recommends that the following scientific problems take highest priority for the next round of scientific drilling in the western Pacific region: (1) origin and development of marginal basins, and their implications for the tectonic history of western Pacific arc systems; (2) origin and tectonic history of oceanic forearcs, with implications for tectonic erosion and ophiolite emplacement; and (3) structure and mechanics of accretionary tectonics. High-priority marginal basins include Japan, South China, Banda, and Sulu Seas. Oceanic forearcs include the Bonin, Vanuatu, Okinawa-Ryukyu, and Lau forearcs. High-priority accretionary wedges include the Nankai and Sunda regions. Other problems have a high scientific merit, such as serpentine diapirism in forearcs and arc reversal in the Solomons, but as yet, the potential for solution by drilling is unclear. The panel encourages input on these and other objectives, especially from citizens of western Pacific countries.