



COVER Pack ice in the marginal ice zone (MIZ) of the Southern Ocean. Springtime melting of the ice results in strong vertical stratification of the water column, which restricts phytoplankton blooms to the near-surface waters of the MIZ. This stability within the MIZ potentially restricts the growing phytoplankton to depths at which midultraviolet (UVB) irradiance has increased significantly in areas beneath the Antarctic ozone hole. See page 952. Detrimental effects of this increased UVB flux on phytoplankton productivity might propagate up the food chain. [Photo by R. C. Smith]

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