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Ecological studies on Recent foraminiferal assemblages along the Mediterranean continental shelf of Egypt

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A suite of 41 bottom samples, collected along the Mediterranean continental shelf of Egypt (depth range 12-120 m) have been examined for their benthic and planktic foraminiferal content. A total of 107 species were identified. Census data were obtained for different species in each sample and the statistically significant fractional abundance values ($\geq 5\%$) were analyzed using Q- mode cluster analysis. Samples were segregated into four clusters, each having its peculiar faunal assemblage (biotope), reflecting particular environmental conditions. R-mode factor analysis has enabled recognition of nine environmentally significant species assemblages. Generic predominance suggests a biogeographic boundary between the Nile Delta and west coast areas, and bathymetric boundaries in both the Nile Delta and west coast areas. The study reveals that water depth, type of substrate, nutrients, salinity, turbidity, light intensity and water energy are the main environmental factors controlling the distribution of foraminiferal taxa.