

**Table 2** List of aquatic palynomorphs observed in sediments of Beppu Bay. In this study, paleontological names for dinoflagellate cysts were used, but in the case of dinoflagellate cysts which do not have paleontological names, names of plankton or biological were adopted with a \* mark after their name.

**Algae**

Dinophyta (Dinoflagellate cyst)  
 Gonyaulacales; *Spiniferites*, *Hiddenocysta*, *Operculodinium*, *Lingulodinium*, *Impagidinium*, *Tuberculodinium*, *Alexandrium*\*  
 Peridiniales; *Brigantedinium*, *Quinquecuspis*, *Lejeunecysta*, *Selenopemphix*, *Stelladinium*, *Trinovantedinium*, *Votadinium*, *Echinidinium*, *Protoperidinium*\*, *Pentapharsodinium*\*, *Scrippsiella*\*, *Dubridinium*, *Niea*\*, *Diplopsalis*\*  
 Gymnodiniales; *Polykrikos*\*, *Gymnodinium*\*, *Pseudocoelochlodium*\*, *Levanderina*\*

Prasinophyta; *Cymatiosphaera*\*, *Pterosperma*

Chlorophyta; *Pediastrum*, *Staurastrum*, *Desmodesmus*, *Scenedesmus*

**Protozoa**

Ameboza; *Arcella*, *Assulina*

Ciliophora; *Cyrtostrombidium*, *Strombidium*, (resting cyst), *Dadayiella*, *Favella*

Foraminifera (foraminiferal linings)

Uniserial type (cf. *Reophax*), Biserial type (cf. *Textularia*, *Bolivina*),  
 Coiled type (cf. *Buccella*, *Ammonia*), Compound type

**Metazoa**

Crustacea; copepod (resting egg), body, appendages, Cladocea (resting egg)

Turbellaria; *Palaeostomocystes* (egg?), *Aegla*-type, *Wahlia*-type, *Syndesmis*-type (egg capsule)

**Acritarcha** (Unknown origin)

*Baltisphaeridium*, *Micrhystridium*, *Ovoidites*, *Concentricystes*, *Joviella*?, *Halodinium*#, *Radiosperma*# (#: possibly resting cyst of Ciliophora suggested by Gurdebeke et al. 2018)