

PALYNOLOGY OF WEAVER ET AL SQUID-1

GENERAL

Two samples of unwashed cuttings from close to TD in Weaver et al. Squid-1, Bass Basin were submitted on 22 August 84 for palynological examination by one of the partners, Bridge Oil Ltd. The samples were only prepared for biostratigraphic study and not for kerogen typing or estimation of maturation level.

RESULTS

SAMPLE	DEPTH(m)	AGE	ZONE
CUTT.	2890-905	PALEOCENE	Lygistepollenites balmei
"	2905-018	"	"

COMMENTS

The extracted residues were similar in both samples, consisting mainly of cuticular and resinous matter with a minor but adequate assemblage of spores and pollen. No dinoflagellates were recognised.

The key forms recognised were *Lygistepollenites balmei*, *Gambierina edwardsii*, *Australopollis obscurus*, *Tricolpites gillii* and *Nothofagidites flemingii*. Pteridophytic spores and gymnospermous pollen were relatively abundant, *Nothofagidites* spp. were rare. These characteristics are all typical of the L. balmei Zone (Stover & Evans, 1973). Partridge (1976) revised the correlation of the palynological and geological time scales and subdivided the L. balmei Zone but did not explain the basis in microfloral terms for his units. Consequently no comment is offered on where within the L. balmei Zone the Squid samples might be referred.

There was no sign of either key or typical forms from either the overlying M. diversus or underlying T. longus Zones.

Rare Permian spores and pollen were recognised; they are probably reworked from Permian rocks at sediment source.

REFERENCES

PARTRIDGE, A.D., 1976. The geological expression of eustacy in the Early Tertiary of the Gippsland Basin. Australian Petroleum Exploration Journal, 16(1), 73-79.

STOVER, L.E. & EVANS, P.R., 1973. Upper Cretaceous - Eocene spore-pollen zonation, offshore Gippsland Basin. Special Publication No.4 of the Geological Society of Australia, 55-72.

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