

This definition can be applied successfully in the west Piopio area, where a number of lithologies are present at the base of the Te Kuiti Group. In general the surface of the Mesozoic basement shows little sign of weathering before the deposition of the Tertiary sediments except where the coal measures are present, because of marine erosion immediately prior to deposition, which has resulted in local irregularities in the basement topography.

In the west, where the Te Anga Subgroup is present, the range in lithologies at the base is from coal measures to conglomerates, grits, sandy and sometimes gritty limestones, and calcareous siltstones. Similar basal lithologies and a more widespread basal limestone were noted at the base of the Te Anga by Barrett (1962) in the Te Anga area, and were included as the Awamarino Member. This division is not recognised in the west Piopio area because the basal lithologies are thinner, discontinuous, and very variable. There is some indication that an impure basal limestone becomes more continuous in the central northern part of the area, and this may grade into the Awamarino Member to the north. An excellent

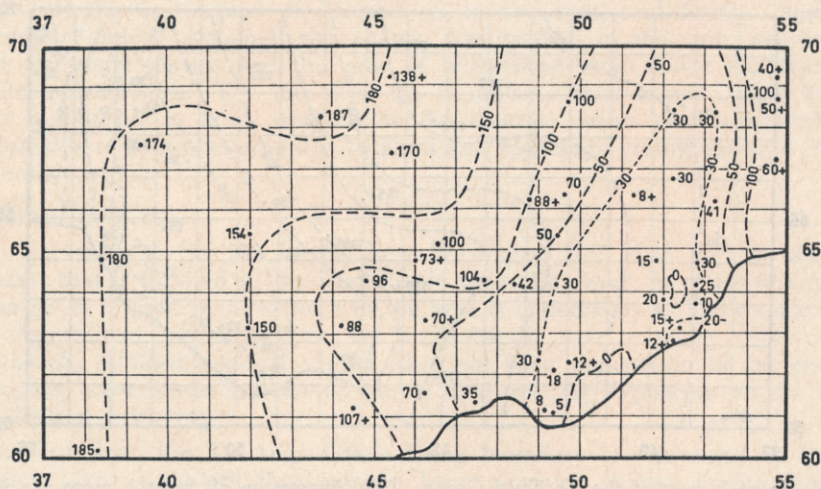


FIG. 5.—Isopach map of the Castle Craig Subgroup.

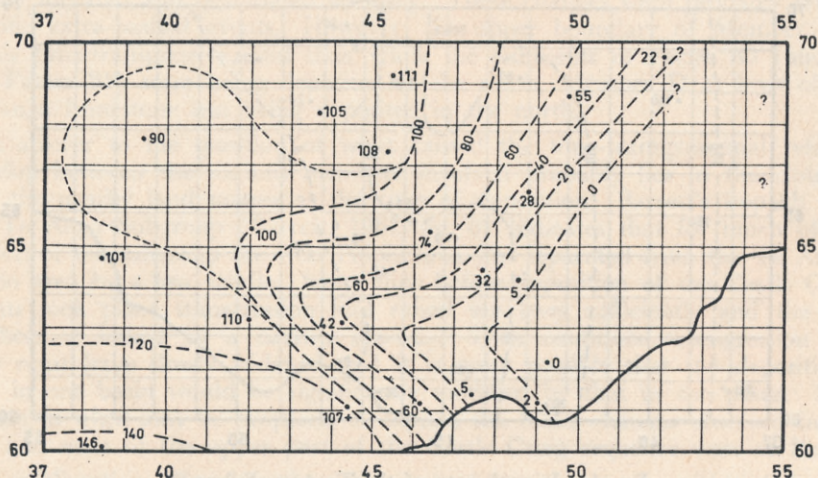


FIG. 6.—Isopach map of the Orahiri Limestone.