D33 GENESIS AND CONSTITUTION OF SRI LANKA KAOLIN

B D S R Silva
Ceramic Research and Development Centre, Piliyandala

The occurrence of kaolin formations at Boralesgamuwa and Meetiyagoda have been known for a very long time and previous work on these deposits has been mainly that of the Geological Survey Department. Recent studies indicate that these deposits do not occur as extensive formations of a uniform character. The material is confined to lenses, pockets and beds of kaolin in the extinct marshes and swamps. The bed rock is mainly a Quartzo-Feldspathic rock and in the Meetiyagoda area a quartz - feldspar pegmatite is of common occurrence from which moonstone is recovered. The deposits are of a residual type and two kaolin refineries have been established (Boralesgamuwa and Meetiyagoda) with a total production of nearly 8000 tons of kaolin (less than 63 microns in diameter) per annum. 45% of kaolin containing 65% of a less than 2 micron fraction is obtained from raw material processed at Meetiyagoda. Two grades are manufactured. Super-grade for high class ceramics with 0.20% Fe_2O_3 and 0.10% TiO_2, and whiteness of 85.5%. The grade 'H' variety analyses 0.50% of Fe_2O_3 and 0.15% TiO_2 and 78% whiteness. At Boralesgamuwa 40% kaolin is obtained from the raw materials and the product with a whiteness of 75% - 78% is only slightly below the quality of the Meetiyagoda kaolin.