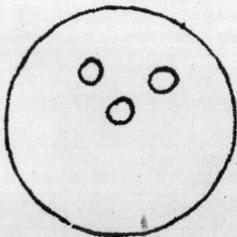


Ackama - juvenile towai difficulty. Griselinia lucida was present near the lunch tables and the leaves seemed to be very large indeed. We wondered if this was an environmental variant and later found that Hooker in 1864 had described a variety beta as "very robust", based on specimens of A. Cunningham from Bay of Islands and of Sinclair, Auckland. Allan had not seen the specimens and thought that perhaps they were only young shoots of G. lucida, but our observations would tend to confirm that a very large leaved form grows there. Perhaps it has an origin like that of the large leaved plants on off-shore islands.

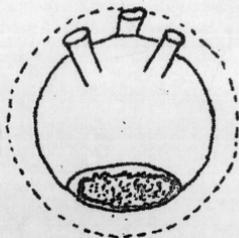
A PYRITES IMPREGNATED COCONUT FROM COOPERS BEACH

E.D. HATCH

Cocos zeylandica Berry, is a walnut-sized coconut of roughly Miocene age, which is washed up fairly frequently on Coopers Beach in Northland, from an eroding off shore fossil plant bed. These little coconuts are remarkably well preserved for their 20 million years, vary from 20-40 mm diameter and are usually scoured by tumbling in the surf. While rounded in outline most are flattened vertically. This is normal in fossil fruits and due to the immense pressures of the overlying rock. I found one however which was quite spherical and this had me puzzled. Why hadn't it collapsed under the weight like the others? I tried to cut it in half and the shell of the nut (some 6 mm thick) cut easily enough, but I might thereafter have been sawing cast iron. I ruined two hacksaw blades before I turned to the emery disc. This was more effective and I found that the hollow interior of the nut was lined with an irregular layer (0.5-2 mm thick) of iron pyrites, a hard glistening silver-yellow crystalline substance. The eyes of the nut were also lined with the crystal, so that the whole thing stripped of its coconut shell, looked like one of those magnetic mines that used to float around during the war, a hollow metal ball with 3 horns.



the nut showing the 3 eyes by which it may be recognised



the pyrites cast showing the ground off base and the 3 tubes which lined the eyes



the ground off base showing the shell layer, the crystal lining & the hollow interior