

R73/85

The survey was to provide control for 1:100,000 mapping using the standard scale RC9 Island photography in the part of the Archipelago east of longitude 123°E. Islands were selected to allow scale and azimuth to be determined on photogrammetric models which contain only a few islands.

2. Establishment: Normal station establishment was carried out on eight islands (see accompanying map), reduced establishment on 2 islands, 2 local control points were established and 7 islands and rocks were co-ordinated by intersections to highest points or distinctive features.

3. Survey : Three stations were fixed by aerodist, seven by checked tellurometer radiation or closed traverses, one by three ray intersection and eight un-marked islands and rocks by two ray intersections.

4. Weather: The weather pattern in the Esperance area is similar to Melbourne. Low pressure areas move from the west every few days bringing strong winds, rain and rough seas. An average of 2 reasonably calm days were experienced at sea per week.

5. Access: Only Daw Island, Island NM/F/684 and Pasley Island provided sufficient shelter to make easy landing in moderate to rough conditions. Only Daw Island has a sandy beach. The edges of the islands consist mainly of smooth granitic rock generally dipping sharply into the water. Some islands have sections of vertical or near vertical cliffs and some tumbled broken rock. Waves continuously break onto or sweep around the whole of the islands unless the sea is very calm. Landing operations were carried out under very difficult conditions on all islands except the first three mentioned. The dingy was swamped on three occasions during landing operations and the following equipment was lost: - a haversack containing binoculars, compass, 20 metre tape and other small items, a tripod and a heliograph. Without the skill of the boatman in handling the dingy during the landings the job would not have been possible.

6. Termination Island: Only one landing spot is possible on Termination Island because of the steepness and smoothness of the rock. A rock ledge at water level in a small bay provides a landing if the sea is very calm.

Two visits were made to Termination on days which seemed reasonable on departure from Esperance. The trip takes 4½ hours one way. A total of 10 hours was spent standing by but at no time was a landing even without gear possible. In the last twenty years the boat charterer has landed 2 or 3 people twice on the island both times without gear for periods of only 1 or 2 hours. Good luck and a very calm sea would be needed to off-load survey gear, carry out a survey and then clear the island.

7. Boat: The boat chartered was 30 feet long overall and was capable of about 8 knots reasonably laden. Although small for the job both the boatmen and the boat performed very well throughout the job.

Because of its shallow draught and manoeuvrability the boat could approach close to the islands. An 11ft aluminium dingy was used which suffered quite a lot of minor damage on the rocks.

8. Names: Some of the islands and rocks visited and intersected in the Eastern group of the Archipelago are un-named on the following maps of the area.

Admiralty chart 1059  
Esperance 1:1,000,000  
Malcolm 1:250,000  
Cape Arid 1:250,000

An inquiry in the district indicates that there are no local names for these islands. During the course of the survey names have been given to the un-named islands involved in the survey. As this appears to be the first survey of the area could steps be taken to forward names to the appropriate West Australian authority?

A number of islands on the Mondrain Island and Cape Arid 250,000 sheets have one name these sheets and another on the Admiralty chart and Esperance 1:1,000,000 sheet.

9. All islands visited were suitable for helicopter landings and I would recommend that a helicopter be used when the second part of the Archipelago is surveyed.