## Antarctic Specially Protected Area No. 101 (Specially Protected Area No. 1) Taylor Rookery, Mac.Robertson Land; Lat 67°26'S, long 60°50'E

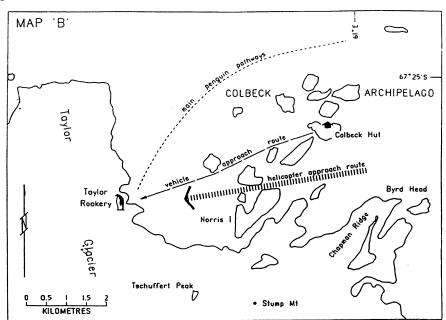
- 1. Description of values to be protected. The area was originally designated a Specially Protected Area because it contains a colony of emperor penguins (Aptenodytes forsteri) which is one of the few, and probably the largest, of the known colonies of this species located wholly on land. Almost all other emperor penguins rookeries are located on sea ice. The rookery is also important because of long-term monitoring of the population of the penguins (since 1954). The colony is ideal for counting since it is surrounded by small rocky hills which make it possible to observe every bird without entering the breeding area. A photographic census programme has been carried out annually since 1988, and it is believed that this method has resulted in almost complete accuracy of counting.
- 2. Aims and objectives. Management of the Area aims to:
  - prevent unnecessary disturbance to the emperor penguin colony at Taylor Rookery; and
  - permit research of a compelling scientific nature which cannot be undertaken elsewhere, while ensuring no significant disturbance to the ecosystem of the area including the penguin colony.
- 3. Management activities. The management plan and activities in the area should be kept under review to ensure that the values for which the area was designated are being fully protected. Inspection visits may be made only when considered essential for management purposes.
- 4. Period of designation. Designated under ATCM Recommendation IV-1 in November 1966, for an indefinite period.
- 5. Description of the area;
  - a. Geographic coordinates and natural features of the Area:

The Area consists of the whole of the northernmost rock exposure on the east side of Taylor Glacier, Mac Robertson Land (67°26'S; 60°50'E). The rookery is located on a low lying rock outcrop in the south west corner of a bay formed by Taylor Glacier to the west, the polar ice cap to the south and the islands surrounded by sea ice to the north and east. The Area is some 90 kilometres west of Mawson station. There is ice free terrain adjacent to the glacier on the western boundary and to the south the rock rises steeply to meet the ice of the plateau. The rock itself forms a horseshoe around a central flat area of exposed rock and moraine. This Area is covered with snow in winter and is occupied by the emperor penguins. The compressed snow melts in summer to form a shallow lake and stream which exists to the north east. The sides of the horseshoe are rounded ridges of rock which are bare and smoothed by ice.

Otherwise the terrain is rough and dissected with cracks and fissures. The average height of the ridges is about 30 metres. The Area also has a raised beach which is typical of several found along the coast of Mac Robertson Land. The beach is composed of locally derived pebbles, cobbles and boulders between 1 cm and 1 m across. It slopes upwards from the shoreline to a well defined platform several metres broad and 3 to 6 m above sea level.

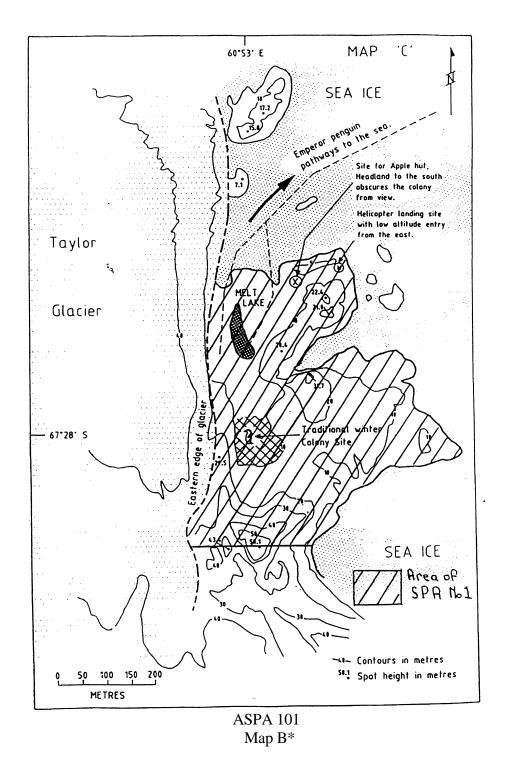
There are no boundary markers since the Area is easily defined by its natural features.

- b. Access to the Area. Access to the Area is only in accordance with a permit or authority issued by a Contracting Party or its authorised representative.
  Restrictions apply to the mode of transport to and within the Area, and access points are prescribed; see Section 8 (a).
- c. Location of structures including scientific stations, research and refuge facilities both within and near the Area. There are no structures within the Area and no permanent structures are permitted. A four-berth refuge is located in the Colbeck Archipelago, approximately 5 kilometres to the north-east of the Area (see Map B): Mawson Station (67°36'S, 62°53'E) is approximately 90 kilometres to the east.
- d. Location of other protected areas in or near the Area. The Rookery Islands (Specially Protected Area No. 2) are located some 80 kilometres to the east of Taylor Rookery (see Map A).
- 6. *Identification of restricted zones*. Access to the emperor penguin colony, marked on Map C, is prohibited unless authorised in a permit.
- 7. Maps of the area. Map A shows the location of the field hut on the Colbeck Archipelago, and access routes to the Area; Map B shows the Area in greater detail, including the usual location of the penguin colony, and the area where all activity such as landing helicopters and installing field huts or field camps should take place, where permitted.



ASPA 101 Map A\*

<sup>\*</sup>Not for navigational purposes. See management plan.



- 8. *Conditions under which permits may be issued*. Criteria for issuing a permit to enter the Area are that:
  - it is issued for a compelling scientific purpose which can not be undertaken elsewhere;
  - the actions permitted will not jeopardise the natural ecological system existing in the Area; and

- the actions permitted are in accordance with the management plan for the Area. *Conditions applying:*
- a. Access to and movement within the Area:
  - i. Whenever possible, access should be from sea ice to the east of Colbeck Archipelago, to avoid disturbance to the birds by crossing their pathways from the rookery to the sea (see Map B). Persons in the vicinity, not approaching the colony, should also be aware of the penguins pathways, and take care to cause as little disturbance to them as possible.
  - ii. Travel to the Area may be by oversnow vehicle, which is generally only possible during the period 1 May to 25 December, or by helicopter. Vehicle entry to the Area is prohibited. Oversnow vehicles used for transport to the Area are to be left outside the Area, to the east, and entry must be by foot. The approach route for vehicles is marked on Map B.
  - iii. Helicopters are not permitted to land in the Area unless sea ice conditions outside the Area are such that it would be hazardous for aircraft to land on ice or for personnel to walk on it. If sea ice conditions are not suitable, helicopters are authorised to land in the Area, to the north-east at the point marked "H", where a headland to the south obscures the colony from view (see Map C). Map B shows the helicopter access route.
  - iv. The following conditions apply to the use of helicopters:
    - helicopters are to approach the Area from the east over the sea ice and, where sea ice conditions permit, land outside the Area, with access being by foot (see Map B);
    - overflight of the rookery is prohibited;
    - when landing outside the Area, helicopters should not land, take off or fly within 500 metres of the rookery;
    - if landing inside the Area is essential due to sea ice conditions helicopters should land in the north-east of the Area at the point marked "H", where a headland to the south obscures the colony from view (see Map C);
    - helicopters approaching to land in the Area must fly as low as possible over the sea ice to avoid disturbing the colony; and
    - helicopters are not to be refuelled within the Area.
  - v. There are no marked pedestrian routes within the Area; pedestrians should keep well away from the penguins unless disturbance to the penguins is authorised by permit. Movement in and around the Area should be such that, in general, the routes used by the birds are not crossed.
  - vi. Dogs are not to be used for transport to the Area.
- b. Activities which are, or may be, conducted within the Area, including restrictions on time and place:
  - i. The penguins are particularly sensitive to disturbance during the following periods:
    - when they are incubating eggs, from mid-May to mid-July; and
    - from mid-July, when feeding chicks to mid-December, when the chicks fledge. However penguins are known to be present at the rookery

during every month except February, when no recorded expeditions to the rookery have been made; restrictions therefore apply year-round.

- ii. The emperor penguin colony is ideal for counting. Normally the best vantage point for viewing and photographing the penguins is a rocky headland which runs adjacent to Taylor Glacier, on the western side of the rookery. The ideal time for a census is from 22 June to 5 July, since during this time only incubating males are present, each representing one breeding pair. An ongoing photographic census programme has been carried out since 1988.
- iii. Other activities which may be conducted in the Area:
  - compelling scientific research which can not be undertaken elsewhere and which will not jeopardise the ecosystem of the Area; and
  - compelling management activities, which if not carried out would jeopardise the values for which the Area was designated.
- c. The installation, modification, and removal of structures:

No structures are to be installed in the Area unless essential for scientific purposes; any structure installed should be removed when it is no longer required. Only the minimum number of personnel necessary to install and to remove the structure should

be used. Temporary field huts if permitted, should be placed well away from the penguin colony at the point marked 'X', to the north-east of the Area, where a headland

to the south obscures the colony from view (see Map C).

*d. The location of field camps:* 

See (c) above.

- e. Restriction on materials and organisms which may be brought into the Area:
  - i. No poultry products, including dried food containing egg powder, are to be taken into the Area.
  - ii. No depots of food or other supplies are to be left within the Area beyond the season for which they are required.
  - iii. Fuel is not to be depoted in the Area, unless required by a visitor for personal use, (i.e.) for cooking/heating in a field hut, and is to be removed when no longer required.
- f. The taking of, or harmful interference with, native flora and fauna: Taking of, or harmful interference with, native flora and fauna is prohibited unless specifically authorised by permit issued in accordance with the Agreed Measures for the Conservation of Antarctic Fauna and Flora, or Article 3 of Annex II to the Protocol on Environmental Protection to the Antarctic Treaty, whichever is appropriate.
- g. The collection or removal of anything not brought into the Area by the permit holder:

There is to be no collection or removal of anything not brought into the Area by permit holder unless specifically authorised by permit for scientific or management purposes.

*h.* The disposal of waste:

No wastes, including human wastes, are to be left in the Area.

- i. Measures that may be necessary to ensure that the aims and objectives of the management plan can continue to be met:
  - permits should specify the maximum number of people allowed entry at any one time.
  - visits to the Area should be kept to the minimum necessary to achieve the research and management objectives.
  - access should be permitted where necessary to place or remove structures or equipments.

## j. Requirements for reports

Each permit holder shall submit a report to the permit issuing authorities detailing the activities undetaken within the Area including a summary of research findings, and comments indicating measures taken to ensure compliance with conditions. Where appropriate, the report may make recommendations relevant to the management of the Area, in particular, as to whether the values for which the Area was designated are being adequately protected. The report should be submitted as soon as practicable after the visit to the Area has been completed.