

Shark Bay Snapper Managed Fishery

MANAGEMENT OVERVIEW

The Shark Bay Snapper Managed Fishery has been in operation since the late 1980s, and has been managed using a mix of input and output controls.

Throughout 1998/99, Fisheries WA management and legal staff have developed a new draft management plan, based on the recommendations of a working group formed to review management of the fishery. It is anticipated that the new plan will simplify the current complex management and administrative arrangements while providing more flexibility for both industry and Fisheries WA.

COMPLIANCE AND COMMUNITY EDUCATION OVERVIEW

Fisheries Officers from Denham and Carnarvon carried out licence inspections and monitored pink snapper landings over the peak season to ensure the integrity of the quota system was maintained. Several minor licensing breaches were found.

Processor monitoring and inspections were also carried out periodically.

Fisheries Officers and management staff held an annual consultative meeting to provide information on compliance and other issues within the fishery.

RESEARCH OVERVIEW

Detailed research on the offshore snapper fishery was undertaken during the 1980s and provides the scientific knowledge base for management.

Monitoring of the fishery is undertaken annually using CAESS data.

This monitoring data has been used to provide the following status report.

Fishery Status Report

Main Features

Stock assessment complete:

Yes

Exploitation status:

The Shark Bay snapper stock is close to fully exploited

Breeding stock levels:

Adequate

Previous catch projections for year 1998:

500-550 tonnes with 1000 standard boat days effort

continued over

Catch current season (1998):

<i>Pink snapper</i>	<i>567 tonnes</i>
<i>Other finfish</i>	<i>143 tonnes</i>

Estimated annual value (to fishers) for year 1998:

<i>Pink snapper</i>	<i>\$2.35 million</i>
<i>Other species</i>	<i>\$0.6 million</i>

Catch projection next year (1999):

550 tonnes

Recreational component (1998):

14 tonnes (estimated)

Boundaries and Access

The Shark Bay Snapper Managed Fishery operates in the waters of the Indian Ocean between latitudes 23°34' S and 26°30' S and in the waters of Shark Bay north of Cape Inscription. There are 24 licences, but some boats have several managed fishery licences aggregated on one fishing boat licence. Catches of snapper in the peak fishing season are subject to individual quotas, while gear controls apply in the off-peak season. The peak season catch in 1998 was 410 tonnes and the off-peak catch was 157 tonnes.

Annual Production

Main fishing method

Mechanised handline.

Landings

Catches of snapper from the ocean stock in 1997 and in 1998 were slightly higher than normal due to improving market capacity as markets other than Japan are developed. The pink snapper catch in 1998 was 567 tonnes. The snapper fishery also took 143 tonnes of other finfish species in 1998.

Fishing effort

The effectiveness of fishing effort varies markedly on a seasonal basis. Fishing effort in 1998 was 984 standard June-July line boat days.

Catch rate

Catch/line boat day of the managed fishery licensed boats for the peak months (June-July) was 576 kg in 1998 (Shark Bay Snapper Figure 1), slightly more than the 10-year average of 552 kg/boat day.

Stock Assessment

The pink snapper stock is close to fully exploited. A stock production model assessment in the mid-1980s produced an estimated maximum sustainable yield of around 600 tonnes.

Breeding Stock Levels

Snapper breeding stock level for the ocean stock is not measured directly; however, there are no indications of insufficient breeding stock from the catch rates,

locations fished or size frequency. This is in contrast to the inner Shark Bay stocks, particularly in the eastern gulf where the breeding stock level is seriously depleted.

Catch Projection for Year 1999

1999 snapper catches are likely to be around 550 tonnes. Effort is likely to be around 1,000 standard June-July line boat days.

Recreational Component

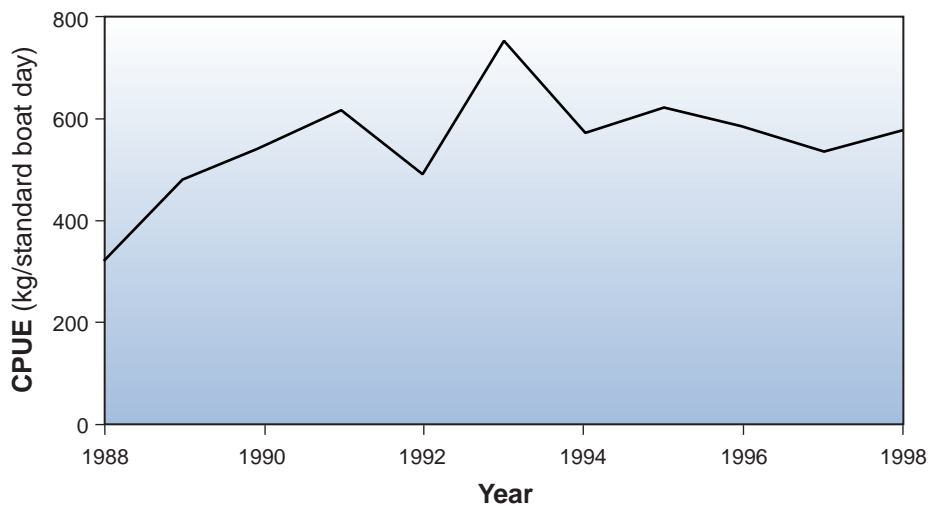
For the genetically distinct inner bay stocks (not covered by this status report), most of the catch is recreational and is now subject to separate management arrangements. Research for management of these stocks is reported under the Recreational Fisheries Program. The Gascoyne Recreational Fishing Survey, conducted between April 1998 and March 1999, has estimated the recreational catch from the offshore stock at 14 tonnes, approximately 2.5% of the commercial catch.

Product Value for Year 1998

Japanese demand for snapper has been declining in recent years and efforts have been made to explore other overseas and eastern states markets. In 1996, prices reached the lowest level for a decade at \$3.90/kg. Average price in the 1998 season was \$4.15/kg.

General Comments

Biologically, the stock exploited by the Shark Bay Snapper Managed Fishery is in good condition and is being successfully maintained by the combination of peak season quotas and off-season gear controls. Simplification of the complex management arrangements under an amended management plan is due to occur in 1999/2000.



Shark Bay Snapper Figure 1 Catch per unit effort by year from 1988 to 1998 for the Shark Bay Snapper Managed Fishery. Units are kg whole weight of pink snapper/standard boat day. As catchability varies markedly throughout the year, peaking in June and July, the CPUE for line fishing in June and July is used as the index of abundance.