

17254



# environment & tourism

Department:  
Environmental Affairs and Tourism  
REPUBLIC OF SOUTH AFRICA

Reference: V1/29/5/1

MINISTER

## TOTAL ALLOWABLE EFFORT (TAE) FOR THE 2008 NET FISHERY (BEACH-SEINE AND GILL NET) SEASON

### 1. PURPOSE

- 1.1 To request you to determine TAE regarding the net fishery (beach seine and gill net (small net/drift net) for the 2008 season in terms of the provisions of Section 14 of the Marine Living Resources Act, 1998 (Act No. 18 of 1998).

### 2. SUMMARY

- 2.1 It is recommended that the 2008 TAE for the net fishery remains unchanged from the last season at 28 Beach seine nets (harders); 3 Beach-seine nets (mixed shoal fish); 35 KZN Beach-seine (sardine); 162 Gill/drift nets; 2 Drag nets; 20 Cast nets; 30 Shove nets. The fishing season for netfish is from 1 January 2008 to 31 December 2008.

### 3. BACKGROUND AND DISCUSSION

- 3.1 For the 2007 season the Minister determined a global TAE of 28 Beach seine nets targeting harders, 3 beach-seine nets for mixed shoal fish, 35 beach-seine nets for sardine, 162 Gill/drift nets, 2 Drag nets, 20 Cast and 30 Shove nets (Annexure A).

The department considered scientific recommendations (Annexure B) and advises as follows:

- In 2000, effort was reduced by 40% in the fishery to allow harders stock to rebuild. Size frequency distributions of the harders suggest that the stock is overexploited and it is advisable that effort levels be maintained as per previous season.
- The TAE for beach-seine and TAE for gill/drift net remain unchanged.

- Recruitment over fishing resulting from the capture of immature fish in the Berg River Estuary has a detrimental impact on the adult stock and catches in the adjacent marine environment; therefore the TAE in the Berg River Estuary should remain at zero.
- The area-by-area TAE is summarised in Table 1 below.

**Table 1.** Recommended TAE (TAE, number of rights holders) for each net fish area in the West Coast.

Area Name	Locality	Beach- Seine	Gill/Drift
A	Port Nolloth	3	4
B	Hondeklipbaai	0	2
C	Doringbaai - Wadrioutsoutpansmond	2	8
D	Wadrioutsoutpansmond - Elandsbaai - Draaihoek	3	6
E	Draaihoek, (Rocheban) -Cape Columbine, including Paternoster	4	80
F	Saldahna	1	5
G	Langebaan Lagoon	0	10
H	Yzerfontein	2	2
I	Bokpunt (Melkbos) - Milnerton	3	0
J	Houtbay beach	2	0
K	Longbeach - Scarborough	3	0
L	Smitswinkel Bay, Simonstown, Fishoek	2	0
M	Muizenberg - Strandfontein	2	0
N	Strandfontien - Monwabisi	0	0
O	Macassar	1	0
OE	Olifants River Estuary.	0	45
BE	Berg River Estuary	0	0
<b>TOTAL</b>		<b>28</b>	<b>162</b>

- Three beach-seine nets for mixed shoal fish, 35 beach-seine nets for sardine, 2 Drag nets, 20 Cast nets and 30 Shove nets are recommended for KwaZulu-Natal.

#### 4. OTHER BRANCHES/CHIEF DIRECTORATES CONSULTED

4.1 The Chief Directorate: Research, Antarctica and Islands was consulted.

5. IMPLICATIONS

5.1 Personnel

Limited.

5.2 Communication

Limited.

6. RECOMMENDATION

It is recommended that the Global TAE 280 nets for the net fishery (beach seine and gill net (small net/drift net) for 2008 season be determined as follows:

Commercial (local) fishing

- Beach seine nets (harders): 28
- Beach-seine nets (mixed shoal fish): 3
- KZN Beach-seine (sardine): 35
- Gill/drift nets: 117
- Drag nets: 2
- Casts nets: 20
- Shove nets: 30

Subsistence and Small scale fishing: 45 gill nets (Olifant's river estuary)

Recreational fishing: nil allocation

Foreign fishing: nil allocation

DIRECTOR-GENERAL

DATE:

RECOMMENDATION IN PARAGRAPH 6 APPROVED/~~NOT APPROVED~~

*I'm still concerned how we are going to accommodate the artificial fields, but accordingly to the PDG:MLC provision will be made.*

MINISTER  
DATE:

*WS*  
*8/12/07*



## environment & tourism

Department:  
Environmental Affairs and Tourism  
REPUBLIC OF SOUTH AFRICA

Reference: V1/22/5/1

### MINISTER

#### TOTAL ALLOWABLE EFFORT (TAE) FOR THE 2006/2007 NET FISHERY (BEACH-SEINE AND GILLNET (SMALLNET/DRIFTNET) SEASON

##### 1. PURPOSE

- 1.1 To request that you determine the TAE regarding the net fishery (beach-seine and gillnet (smallnet/driftnet) for the 2006/2007 season in terms of the provisions of Section 14 of the Marine Living Resource Act, 1998 (Act No. 18 of 1998).

##### 2. BACKGROUND AND DISCUSSION

- 2.1 It is recommended that the 2006/2007 TAE for the beach-seine and gillnet fisheries remains at 28 and 162 rights respectively. This represents a 0% reduction in the gillnet TAE and a 50 % reduction in the beach-seine TAE. The fishing season for netfish is from 1 January to 31 December.
- 2.2 For the 2005/2006 season you determined a TAE of 68 beach-seine nets, 177 gill/drift nets and 3 beach-seine nets for mixed shoal fish, 2 drag nets, 20 cast nets, 30 shove nets and 35 sardine beach-seine nets (Annexure A).  
The department considered the recommendations from the Chief Directorate: Research, Antarctica and Islands of the Branch: Marine and Coastal Management (as per Annexure B) and wishes to advise as follows:
  - In 2000 a 40% reduction in this fishery was recommended and approved to facilitate the rebuilding of the harder stock.

- In light of the 2000 reduction and the level of effort that would allow the recovery of the stocks, it is advisable to maintain the current effort levels in this fishery.
- The area-by-area TAE is summarised in Table 1.
- The beach-seine TAE is being reduced by 50%, although the TAE for gillnet remains the same.
- Size frequency distributions of the harders caught suggested that the stock is overexploited on a local and national scale. There was a strong negative correlation between effort (number of nets) and the size of fish caught.
- The TAE for Area 5 (Doornbaai-Lambertsbaai) and Area 6 (Olifantsriviermond-Wadrifsoutpansmond) should be maintained at 2 beach-seine and 8 gillnet rights.
- Currently there are 45 exemption holders who are fishing in the Olifants River Estuary with 45m nets. However, with the phasing out of fishing in the Olifants River Estuary within the next 10 years, fishers may be accommodated in Areas 5 and 6.
- The TAE in the consolidated Areas 8, 9 and 10 (the area between the beacon marked MO 1 directly opposite the farm Draaihoek in St Helena Bay and Cape Columbine) should remain at 4 beach-seine and 80 gillnet rights.
- Recruitment over fishing resulting from the capture of immature fish in the Berg River Estuary was having a detrimental impact on the adult stock and catches in the adjacent marine environment, therefore the TAE in the Berg River Estuary should remain at zero.
- The TAE in Area 12 (Langebaan Lagoon) should be maintained at 11 gillnet (smallnet) rights.

- The TAE in the consolidated Areas 14 (Melkbosstrand) & 15 (Bokpunt, Melkbos-Milnerton) should be reduced from 5 to 3 beach-seine rights.
- The TAE in Area 18 (Smitswinkel Bay-Simonstown-Fishoek) should be reduced from 5 to 2 right holders
- Since catches in the Areas 23 and 24 mainly reflect line fish species and not harders, which are economically unviable in this area, it is recommended that the TAE in these areas be reduced to zero.

### 3. IMPLICATIONS

3.1 Personnel  
Limited.

3.2 Communication  
Limited.

### 4. RECOMMENDATIONS

It is recommended that:

- 5.1 the global Total Allowable Effort (TAE) for the net fishery (beach-seine and gillnet (smallnet / driftnet) for 2006/2007 be determined as follows, and that such TAE be apportioned and allocated in the following categories:

Local commercial:

- |  |     |
|--|-----|
| • Beach-seine nets (harders):          | 28  |
| • Gill/drift nets:                     | 162 |
| • Beach-seine nets (mixed shoal fish): | 3   |
| • Drag nets:                           | 2   |
| • Cast nets:                           | 20  |
| • Shove nets:                          | 30  |

- Beach-seine (sardine): 35

Recreational fishing: nil allocation

Subsistence fishing: nil allocation

Foreign fishing: nil allocation

5.2 The effort levels per area be determined as per Table 1.

*Recommended by DG and EDMS 4/10/2006.*

DIRECTOR-GENERAL  
DATE:

RECOMMENDATIONS  
5.1 APPROVED/NOT APPROVED  
5.2 APPROVED/NOT APPROVED

MINISTER  
DATE:

*KT*  
*10/10/06*

DEPARTMENT OF ENVIRONMENTAL AFFAIRS AND TOURISM  
MARINE AND COASTAL MANAGEMENT

RECOMMENDATIONS FOR MANAGEMENT TOWARDS SUSTAINABLE BEACH-  
SEINE AND GILLNET (SMALLNET / DRIFTNET) FISHERIES IN 2006/2007

August 2007

Summary

It is recommended that the 2007 / 2008 Total Allowable Effort (TAE) for the beach-seine and gillnet fisheries remain at 28 and 162 rights / exemption holders respectively. Recommended adjustments (and associated rationale) to the beach-seine and gillnet TAE and Areas of operation are provided. Although the policy issues are similar (e.g. the phasing out of all estuarine gillnet fisheries), this document does not contain any reference to the TAE's for the pilchard beach-seine, mixed shoaling fish beach-seine, shove-net or drag-net fisheries in KwaZulu-Natal.

Introduction & background to the current beach-seine & gillnet TAE

Two three year projects, one assessing the False Bay beach-seine fishery and the other, the gillnet and beach-seine fisheries throughout the southwestern Cape, were completed prior to the call for applications for rights in these fisheries in 2001. Until then, some 450 licenced permit-holders used about 1 350 nets and an unknown number, perhaps a further 100, used another 400 illegal nets. The vast majority of these fishers were occupied with netfishing for a short period over the summer and autumn months, and either had other occupations such as teaching or farming or spent the rest of the year in other branches of the fishing industry, such as the pelagic, rock lobster and linefish (snock and hottentot) fisheries. Many of the participants (including crew members) were retired from fishing activities and participated in the netfishery to supplement incomes and food supplies. Many were desperately poor and employed seasonally as crew or factory workers. Overall, there was excess effort allowed in the fishery. Many only went to sea a few times each year, catching small quantities of fish. They only went to sea when they heard about harders (*Liza richardsoni*) being plentiful from the active participants. They then flooded the few small factories with fish, which maintained the price but refused to take any more fish in than could be processed or sold fresh. This extra effort interfered considerably with the viability of the regular full-time fishers.

Approximately 6 000 t per annum were landed by the beach-seine and gillnet fisheries. The gillnet fishery accounted for 3 250 t of harders, 650 t St Joseph shark (*Callorhynchus capensis*) and 130 t of bycatch comprising at least 27 species. Illegal gillnetting landed approximately 100 t of houndshark (*Mustelus mustelus*) and 50 t of linefish (mostly galjoen (*Dichistius capensis*), a de-commercialised species). Beach-seine permit-holders landed approximately 1 950 t of harders, and in excess of 200 t of bycatch, mostly linefish species.

Size frequency distributions of the harders caught suggested that the stock is overexploited on a local and national scale. There was a strong negative correlation between effort (number of nets) and the size of fish caught. This was not surprising considering that effort ranged from 0.5 nets per km of coastline in Langebaan to 15 nets per km in St Helena Bay. Also relevant was the linefish bycatch, most of which comprised species regarded as overexploited or

collapsed. In turn, most of this catch comprised juveniles below minimum legal size before they were recruited into the linefishery.

It is unlikely that the beach-seine and gillnet fisheries were generating more than R20 million annually. Many of the operators (20-60%) were running at a loss, especially in oversubscribed areas such as the Berg River and St Helena Bay. The loss experienced by most fishers also indicated the "recreational" nature of many of the participants. Indeed, less than 4 % of permit holders interviewed regarded themselves as netfishers and were either retired or employed elsewhere in other fishing sectors and various jobs.

#### Recommended amendments to the TAE

The fishery is managed on a TAE basis with a set number of operators in a netfish area. In light of the above, in 2000 the Minister approved a 40% reduction in the TAE to facilitate rebuilding of the harder stock and to remove "part-timers" from the fishery. The same TAE levels applied from 2001 onwards. The TAE, which is set on an area-by-area basis, is summarised in Table 1. The TAE is based on the number of fishers who could maintain a viable income in each area and the level of effort that would allow recovery of the harder stock. The 2007 – 2008 TAE should remain the same as that for 2006 – 2007.

Historically, the netfish areas included Walvis Bay and Luderitz (Areas 1 & 2). Since the independence of Namibia, the netfish areas run from Area 3 (Port Nolloth) on the West Coast to Area 34 (Buffels Bay-Nature's Valley) on the South Coast. Most of the netfishing areas were demarcated in a genuine attempt to control fishing effort and reduce conflict between competing fishers. However, in a few cases, in what amounted to a cynical application of the Group Areas Act, areas were adjusted to exclude PDI fishers from "white" beaches. Consequently, for practicality and to address these past inequities, some netfish areas have had their boundaries altered and/or been consolidated.

Due to the adjustment and consolidation of the netfish areas, the area numbers, in most cases, no longer make any sense and need to be renamed. Consequently, it is recommended that there now be 15 netfish areas, these being A to N and the Olifants Estuary (Table 1). Further, each right holder should be linked to an area by his/her right holder specific permit number. This permit number must remain unchanged with the annual permit renewals so that management can track individuals and to facilitate continuity in catch data entry.

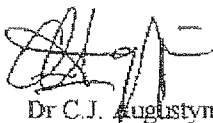
e.g. NA03 where N refers to the netfishery

A refers to Port Nolloth

03 refers to the third individual issued a permit in Port Nolloth

Table 1. Recommended Total Allowable Effort (TAE, number of rights holders) for each netfish area. Levels of effort are designed to facilitate recovery of the harder stock and based on the number of fishers who could maintain a viable income in each area.

Area	Locality	Beach-seine	Gill/drift
A	Port Nolloth	3	4
B	Haudeklipbaai	0	2
C	Olifantsriviermond-Wadrijsoutpansmond	2	8
D	Wadrijsoutpansmond-Elandsbaai-Draaihoek	3	6
E	Draaihoek, (Rochespan)-Cape Columbine, including Paternoster	4	30
F	Saldhana Bay	1	5
G	Langebaan Lagoon	0	10
H	Yzerfontein	2	2
I	Bokpunt (Mefibos)-Milnerton	3	0
J	Houtbay beach	2	0
K	Longbeach-Scarborough	3	0
L	Smitswinkel Bay, Simonstown, Fishoek	2	0
M	Muizenberg-Strandfontein	2	0
N	Macassar	1	0
OE	Olifants River Estuary	0	45
Total		28	142



Dr C.J. Augustyn

Chief Director: Research and Antarctica & Islands

Date: 14 September 2007

