

ECONOMIC IMPORTANCE OF TROUT CULTURE IN TURKEY

Kadir DOĞAN

Istanbul University, Fisheries Faculty, Department of Aquaculture, Ordu Cad., No: 200, 34470 Laleli, Fatih-Istanbul, Turkey.
Email: kadogan@istanbul.edu.tr, dogank62@hotmail.com

ABSTRACT

In the last decade, the culture of rainbow trout has become an area of economic activity which shows a great development and brings economic return and employment in Turkey. In the first years of aquaculture, rainbow trout production of Turkey was 990 tons in 1986 and this amount was increased to 3.323 tons in 1990. It has showed a rapid incensement in the last years and the amount of production has reached to 85.244 tons in 2010.

In this study, the present potential of rainbow trout production, its impact on economy, socio-economical structure of this sector and structural and economical status of trout farms depending on their locations were analyzed. Rainbow trout, which is cultured in the whole Turkey commonly, is produced in 1.573 farms that are located in 73 cities of Turkey. 51,0% of the total aquaculture production is obtained from rainbow trout production. When this rate of production is taken into consideration, the added value to the Turkish economy is very high. Depending on the 2010 data, rainbow trout production constitutes the 17.4% of total fisheries income and 35.0%, of total aquaculture income.

In conclusion, rainbow trout production has an important part in the aquaculture sector. Presence of active trout farms in every part of the country makes a great contribution to the rural development by making a good use of the sources of country, making employment and the its economical income.

Keywords: rainbow trout, fish farm, project, structural features, economical analyze

INTRODUCTION

Aquaculture has been designated as the fastest growing food sector in the world by the FAO. The total amount of fishery products that were obtained by aquaculture has arisen from 7.4 M ton in 1980 to 16.8 M ton in 1990, to 39 M ton in 2002 and to 50 M ton in 2007 in the world. Aquaculture meets approximately 30% of the world's fishery production and grows increasingly at a rate of 10% annually (Anon, 2007). China, India and Vietnam rank first in aquaculture in the world. Turkey ranks 26th in the world and they contribute to 0.27% of the world's total production. 2.6% of the world's total aquaculture products are produced by the European Union countries. In comparison to the European Union countries, Turkey ranks as the 5th in aquaculture production.

Aquaculture in Turkey was initiated by the production of rainbow trout and mirror carp in the inland waters. The first rainbow trout farm in the inland waters has been established in 1970. Sea bass and sea bream production enterprise has been put in operation in 1985. According to the data form 2009, a total of 1832 enterprises are present that are currently involved in aquaculture. The total aquaculture production in these enterprises has been eventuated as 158, 729 ton. The contribution of this value in the national economy is approximately 950 M TL (Anon, 2009).

In Turkey, trout culturing is conducted in the inland waters and in the seas, sea bass and sea bream culturing is conducted. In order to increase the diversity in aqua-culturing novel potential species are investigated and application studies are being conducted.

The fishery products aquaculture in Turkey has been undertaken in the present article and suggestions have been given regarding the culturing potential, its present condition and its goals towards the improvement of fishery product aquaculture as well as suggestions regarding its general policy.

METERIAL AND METHOD

The material of this study is the fish farms that produce rainbow trout in marine and inland waters of Turkey. The statistics of Turkish Ministry of Agriculture and Rural Affairs, General Directory of Agricultural Production were used for this purpose. The number of rainbow trout farms, their distribution to the cities, project capacities, production amounts, contribution to the Turkish economy were researched and analyzed depending on the present data.



RESULTS AND DISCUSSION

Rainbow trout (*Oncorhynchus mykiss*) which is commonly cultured in Turkey is produced in 1.573 farms that are distributed in 73 different cities. 51.0% of total aquaculture production is obtained from rainbow trout culture. When this rate of production is taken into consideration, the added value to the Turkish economy is very high. Depending on the 2010 data, rainbow trout production constitutes the 17.4% of total fisheries income and 35.0%, of total aquaculture income.

The production amount of 990 tons which was obtained in 1986, in the beginning of rainbow trout production has shown a constant increase year by year and reached to 85.244 tons in 2010. Depending on the 2010 data, the added value brought in to the Turkish economy and aquaculture sector by rainbow trout production is 1.429.852.702 US\$.

27.0% of the present trout farms are operating in the Black Sea region, 19.5% in the Mediterranean region, 5.7% in the Marmara region, 10.6% in the Central Anatolia region, 17.2% in the Aegean region, 16.9% in the Eastern Anatolian region and 3.1%, in the South Eastern Anatolian region.

In conclusion, rainbow trout production has an important part in the aquaculture sector. Presence of active rainbow trout farms in every regions of Turkey makes a great contribution to the rural development by making a good use of the sources of country, making employment and its economical income. Despite this high potential, the rate of aquaculture is relatively low. The efficient evaluation of these potential using new technologies is very important in economical and social point of view.

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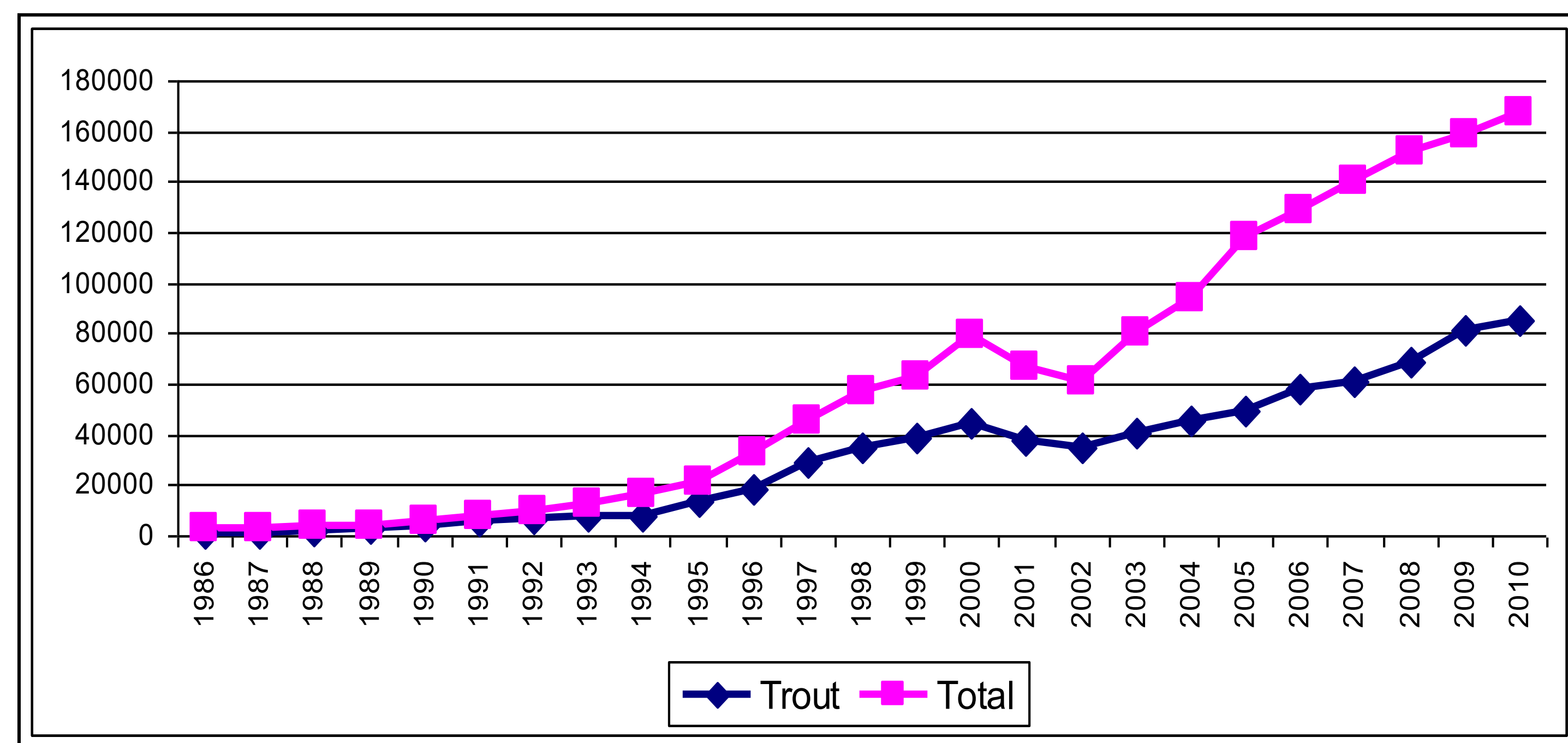


Figure 1. Total aquaculture and rainbow trout production in Turkey (1986-2010) (Ton)



General view of Turkey's trout aquaculture farms.

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