



HAL
open science

Difficulties in the management of Atlantic salmon stocks in France

Max Thibault, Pierre Rainelli

► **To cite this version:**

Max Thibault, Pierre Rainelli. Difficulties in the management of Atlantic salmon stocks in France. 1981, 6 p. hal-01600670

HAL Id: hal-01600670

<https://hal.science/hal-01600670>

Submitted on 2 Oct 2017

HAL is a multi-disciplinary open access archive for the deposit and dissemination of scientific research documents, whether they are published or not. The documents may come from teaching and research institutions in France or abroad, or from public or private research centers.

L'archive ouverte pluridisciplinaire **HAL**, est destinée au dépôt et à la diffusion de documents scientifiques de niveau recherche, publiés ou non, émanant des établissements d'enseignement et de recherche français ou étrangers, des laboratoires publics ou privés.



Distributed under a Creative Commons Attribution - NonCommercial - NoDerivatives 4.0
International License

108-PA

INRA.ESR-
REN.

THIS PAPER NOT TO BE CITED WITHOUT PRIOR REFERENCE TO THE AUTHORS

International Council
for the Exploration
of the Sea

CM 1981/M : 17
Anadromous and
Catadromous Fish
Committee

DIFFICULTIES IN THE MANAGEMENT OF ATLANTIC SALMON STOCKS IN FRANCE

by

THIBAUT M.* , and RAINELLI P.**

* Laboratoire d'Ecologie hydrobiologique, I.N.R.A., 65, rue de Saint-Brieuc,
35042 RENNES CEDEX FRANCE

** Station d'Economie et de Sociologie rurales, I.N.R.A., 65, rue de Saint-Brieuc,
35042 RENNES CEDEX FRANCE

RESUME

Les difficultés de gestion des populations de saumon en France résultent d'un ensemble de conditions d'ordre historique (opposition du pouvoir central aux pêcheries surtout depuis le milieu du 17^{ème} siècle), sociologique (prééminence de la pêche à la ligne depuis environ un siècle) et écologique (politique restrictive de protection de l'espèce et priorité au déversement de poissons élevés en pisciculture).

ABSTRACT

The difficulties in the management of Atlantic salmon in France result from a group of conditions of the following nature : historical (government opposition to fisheries, chiefly since the middle of the XVIIth century), sociological (preeminence of angling since about one century) and ecological (limitative policy in species protection and priority given to stocking of hatchery-reared fish).

I. INTRODUCTION

If a truth is commonly recognized among French scientific and administrative circles, it is indeed the great regression in salmon catches with regard to the Ancien Regime (DUMAS et al., 1979 ; VIBERT, 1980). Taking up the argumentation evolved during the past century (PARÂTRE, 1894, p. 23), one ascribes this strong decrease to institutional reasons. The 1789 Revolution, by giving free

access to resources, would be at the origin of the dilapidation of this biological patrimony. It should be noted that NETBOY (1968 and 1980) contributed to spread this idea out of France.

The always cited example of a past abundance is that of the Brittany province (Breton coastal rivers and Lower Loire) which, under the Ancien Regime, would have produced 4,000 tons of salmon per year, that is 1,000,000 individuals. Now information available at the beginning of the XVIIIth century, in particular a record of all fishing places, allow to figure out catches at a maximum of 60,000 individuals. Besides, the study of the various decrees in relation with fishing shows that the Revolution did not change anything in the exploitation conditions of salmon. Fishing remained entirely free until the middle of the XIXth century, its regulation taking place at different periods in the year according to departments (THIBAUT and RAINELLI, 1980).

The present situation of Atlantic salmon is characterized by the pre-eminence of angling in relation with a practically non-existent commercial fishing. It is also underlined by a lack of fishery management and the vanishing of this species from about twenty streams since one century (THIBAUT, 1980). This actual state results from a group of economical and social factors which can only be perceived in their historical frame.

II. SOCIO-ECONOMICAL FACTORS AT THE ORIGIN OF THE PRESENT SITUATION

In course of History, the exploitation of river resources has always taken place in opposition with the other users of the stream, as many economical interests were divergent. It also fits into an institutional context characterized by conflictive relationships between Monarchy and the Nobility.

II.1 - Part of streams in the process of time

Streams, which are an appreciable source of energy, constitute an essential means of communication, chiefly under the Ancien Regime. Indeed in a country which is a gathering of provinces and seignories between which economical exchanges are difficult owing to road conditions, large rivers and streams play a vital part. This is true as well in Brittany at the XVIth and XVIIth centuries (CROIX, 1981) as during the XVIIIth century in areas crossed by the Dordogne river (COCULA-VAILLIERES, 1979). The importance of the Seine or Loire on a regional or national level is well known. If operating conditions on a river, such as floating (flottage à bûches perdues) ; rafting (flottage en train) or transport by boat are

complementary, on the contrary there is an incompatibility between navigation and fishing places. These last ones represent an obstacle to circulation and even endanger bridges at the time of floods. Such is the case of Nantes for instance.

The river which is the basis of economical exchanges is also a political stake. Until the end of the XVth century, riparian lords secure and protect circulation and consequently levy a toll, but they also exploit fishing sites. In the XVIth and XVIIth centuries, the Monarchy reinforces its power and its primacy over feudal power gets stronger.

A change in the river life is slowly beginning owing to the expansion of communication means by land, but it is chiefly the advent of railways in the middle of the XIXth century which is the turning point setting apart definitively Man from river, as shown by COCULA-VAILLIERES (1979, p. 620) for the Dordogne.

II.2 - Difficulties in exploiting stream resources

Commercial fishing has been in jeopardy in course of centuries by reason of economical requirements but also because of a priority granted to marine fisheries from the point of view of national defence. More recently another conception of river fishing, of a sportive type, has occurred.

II.2.1. - Relationships between Monarchy and Nobility

There is a double reason for the unceasing fight of Monarchy against fisheries sites, under the Ancien Regime. On one hand it aims at the reconquest of the royal estate seized by seignories and private people (TREMEMENT, 1941). On the other hand the part of rivers as navigational roads has been privileged rather than their alimentary function. If streams have contributed to the transport of food for populations, it has never been a priority in their utilization, just an objective among others, as for Loire and Dordogne. Most of the time fish production appears as a secondary product.

The unceasing fight of Monarchy results in the recovery of property of navigable rivers. The various regimes following after Monarchy do not at all renounce this inheritance, since the Legislation under Revolution, consolidated under the Empire, carries on the objectives of the Government representatives since COLBERT (COCULA-VAILLIERES, op. cit., p. 370-373). This recovery by the State does not mean an economic interest towards fish resources. The Government always gave attention but to marine fishing, and this only in view of national defence, COLBERT considering fisherman as a reserve of men for the Navy, from

which the institution of seamen registered for service in this body (Inscrits maritimes). This same frame of mind shows through in a letter sent to NAPOLEON III by the Minister DUCOS (cited by TREMEMBERT, 1941, p. 240).

II.2.2. - Part played by organizations of anglers

At the end of the XIXth century, a new type of fishermen appears, the sport fishermen. For them, to catch salmon, this noble fish, is a first rate hobby intended for the Elite only. Its gratuitousness, the quality of the pleasure given are opposed to the matter of fact and destroying behaviour of "Inscrits maritimes" and other fishermen who get some profit from fishing. This elitist conception of salmon fishing fits into the ideological context of this period. It is then that appear concomittantly figures on the past abundance of salmon and diatribes against the disastrous part played by Revolution through the free practice of fishing rights (THIBAULT and RAINELLI, 1980, p. 65-66).

Associations of anglers obtain modifications of fishing seasons (leading to reduce the fishing periods for professionals). They also obtain interdiction of fishing gear in freshwater (case of "baros" in Southwest of France : Gaves, DUNOUAN, 1925). or in estuaries (beginning of 1970s' in Brittany).

II.3 - Overexploitation : subject of concern for the species future

As part of this fight of Monarchy against fishing sites, a third reason is often evoked, it is the destruction of spawn and seeds by fishing nets with too small meshes, which lead officers from the Eaux and Forêts Services to predict the depletion and unstocking of rivers (COCULA-VAILLIERES, op. cit., p. 247).

Since an imperial decree taken on october 19, 1863, is is prohibited to fish salmon in winter season (from october 20 to january 31) in all French streams, in freshwater. By regard for harmonization, a comparable decree is issued on next october 24 by the Marine Minister for marine littoral zone and estuaries. The aim of these interdictions was the care for public and common interests, the fight against present and oncoming depletion and safeguarding of the future, as appears from the citations made in support of this measure in letters from the Minister of Public Works, from deputies and from the Prefect of the Loire department from 1863 to 1876 (THIBAULT and RAINELLI, 1980, p. 53).

In spite of this measure worries concerning river depletion go on at the end of the XIXth century and during the XXth one. Catches qualified as exces-

sive (VIBERT, 1973) are considered as responsible for the decrease in catches, and even in stocks (DUMAS et al., op. cit.). Fishing in estuaries is particularly affected (ROULE, 1913). These various assertions have in common not to be supported by any close demonstration, so obvious is the fact.

III. CONCLUSIONS

Protective measures of species taken in the middle of the XIXth century present a very incomplete character as they only concern catches and do not take into consideration either stocks, or natural production areas. Their efficiency appears most limited since salmon has all the same disappeared from twenty French rivers since one century. One can even wonder whether these measures have not had pernicious effect.

Fundamentally salmon vanishing from some rivers can be attributed to the industrial and urban development of the country. The setting of dams with clearing devices, together with the discharge of polluting effluents, have contributed to eliminate this species from some river areas, provoking a strong decrease in wild juvenile production.

Often excessive assertions from anglers' representatives did not help to clear up discussions or to set the real problems. Since on century, the whole discussion has been centered on catches but without considering climatic conditions, fishing techniques or even natural fluctuations. One has mainly criticized the "Inscrits maritimes" poachers and professionnels. In the logical line of reasoning based on flows and not on stocks, river stocking is considered only by means of hatchery-reared juveniles.

Three elements have established the confusion concerning this salmon problem since on century in France (catches only are taken into consideration, in a restrictive way, hatchery-reared fry stocking is thought to be the panacea, decreasing potentialities of production in natural conditions are ignored). Now BLANCHARD (1866) and others underline the importance of habitat for fish. In 1895, HENNEGUY proposed to take into consideration ecological characteristics of fish to establish different fishing periods according to streams (cited by PAULZE D'IVOY DE LA POYPE, 1901, p. 184). They were not heard.

At the expiration in 1980 of the 5 years French "Plan Saumon", it is possible to wonder about the way stock management is contemplated nowadays.

BLANCHARD's and HENNEGUY's observations and proposals are still of a topical interest. Their adaptation to present conditions would probably allow a better exploitation of resources, but this supposes an evolution of the state of mind of responsible people, putting aside flows for a better consideration of stocks.

IV. BIBLIOGRAPHY

- BLANCHARD E., 1866. Les poissons des eaux douces de la France. 1 vol., Baillière et fils, libraires, Paris, 656 p.
- COCULA-VAILLIERES A.M., 1979. Les gens de la rivière de Dordogne, 1750 à 1850. 2 vol., Thès. Doct., Univ. Bordeaux III, 740 p.
- CROIX A., 1981. La Bretagne aux 16^e et 17^e siècles. La vie - la mort - la foi. Tome 1, maloïne S.a. Edit., Paris, 779.
- DUMAS J., PROUZET P., PORCHER J.P., DAVAINÉ P., 1979. Etat actuel des connaissances sur le saumon en France. Journées Aquacult. ext. Repeuplement, Brest, mai 1979, doc. 20, Centre Océanologique Bretagne, 28 p. dactyl.
- DUNOUAU O., 1925. La pêche du saumon dans les Basses-Pyrénées. 1 vol., V. Marringpou ainé, graveur imprimeur, Pau, 73 p.
- NETBOY A., 1968. The Atlantic salmon. A vanishing species ? 1 vol., Faber and Faber, London, 457 p.
- NETBOY A., 1980. Salmon. The world's most harassed fish. A Deutsch limited, London, 304 p.
- PARÂTRE R., 1894. Du dépeuplement des cours d'eau de l'Indre. Bull. Soc. cent. Aquic. Pêche, 6, 1-30.
- PAULZE D'IVOY DE LA POYPE, 1901. La question de la pêche dans le bassin de la Loire. 1 vol., Bousrez Edit., Poitiers, 318 p.
- ROULE L., 1913. Le dépeuplement en saumons des cours d'eau de la Bretagne et les moyens de repeupler ces derniers. Bull. Soc. cent. Aquic. Pêche, 25, 17-33.
- THIBAUT M., 1980. Aménagement et gestion des rivières à saumon atlantique du Massif armoricain. Troisièmes assises internationales de l'environnement, 9-11 décembre 1980, Paris, 12 p. dactyl.
- THIBAUT M., RAINELLI P., 1980. L'abondance passée du saumon atlantique : mythe ou réalité ? (essai de synthèse à partir de l'exemple de la Bretagne). Bull. Sci. Techn. Dep. Hydrobiol. Inst. Nat. Rech. Agr., 9, 78 p.
- TREMEMBERT J., 1941. Les pêcheries en Bretagne méridionale jusqu'à la fin de l'Ancien Régime. Thès. Archiv. Paleogr. Ecole Chartes, Univ. Paris, 240 p. manus.
- VIBERT R., 1973. Problèmes essentiels posés par la restauration des rivières à saumon - Réunion d'information sur le saumon - C.N.E.X.O.-I.N.R.A., 5 juin 1973, Biarritz, 12 pages dactyl.
- VIBERT R., 1980. Perspectives. Le Saumon en France (numéro spécial). Saumons, 34, 73-76.