

ECONOMIC EFFECTS OF THE CASTASTROPHE OF THE PRESTIGE: AN ADVANCE

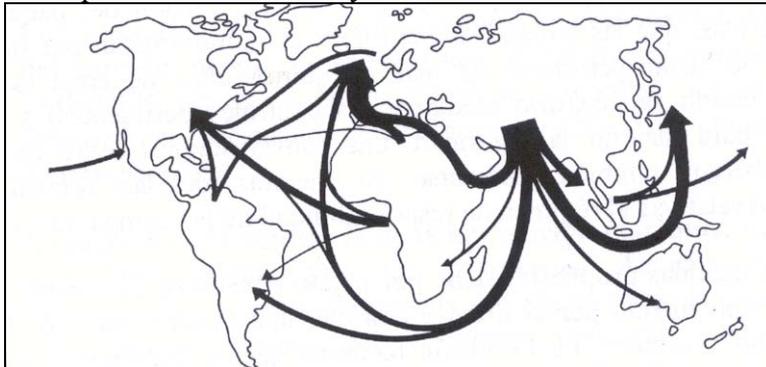
María Xosé Vázquez, Manuel Varela e Albino Prada

1. Introduction

In the afternoon of November 13, 2002, one of the 1,400 oil tankers that annually navigate off the coasts of Galicia, this one with a particularly inappropriate name – the Prestige – sprung a leak 30 miles east of Finisterre. The 25-year-old single-hull ship was transporting 77,000 tons of heavy fuel oil from Lithuania to an undetermined destination. Under a Bahamian flag, it was owned by a Greek shipping company and the charterer was Anglo-Swiss.

Map 1

Principal routes of world hydrocarbon traffic



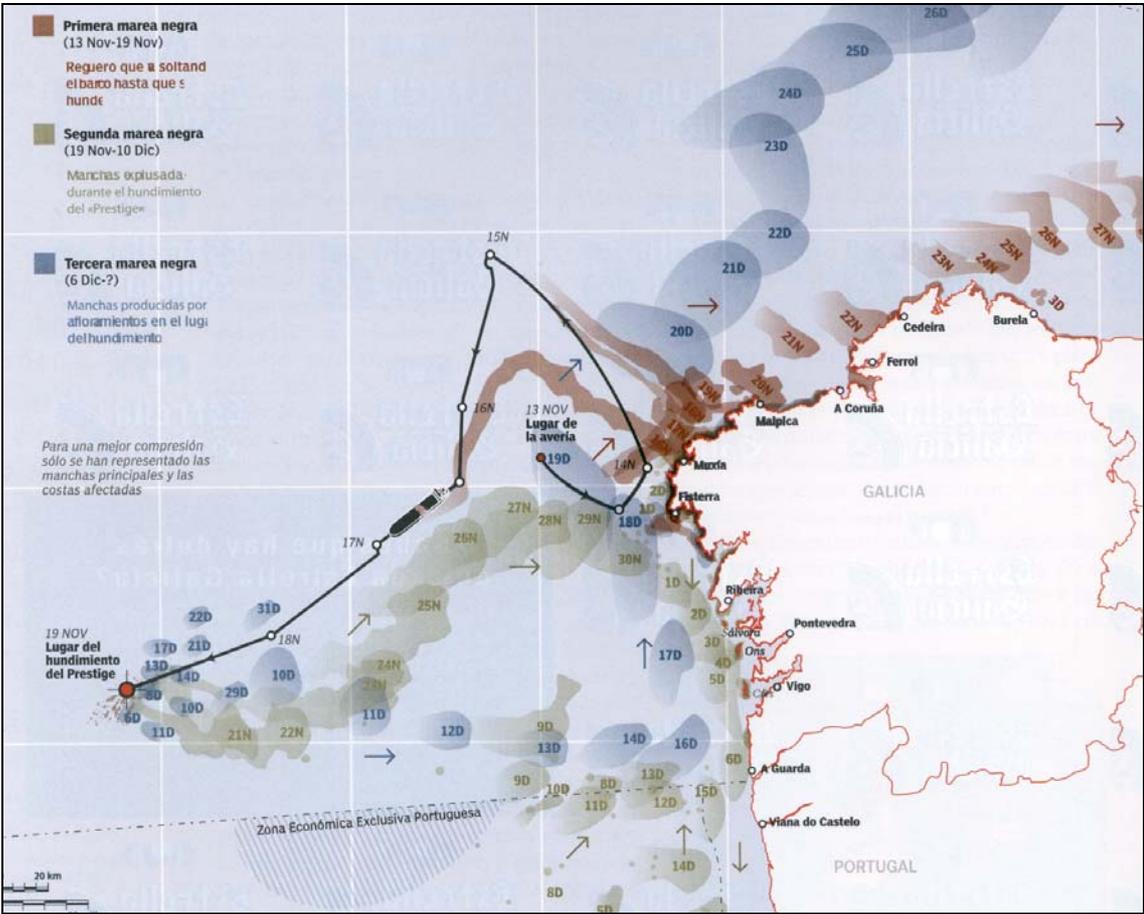
Source: COM(2000) 142 end

Leaving aside any consideration of motives, starting from this moment the only objective facts are the towing of the ship during the 14th and 15th, following a north-easterly course and subsequently going southeast until the vessel broke in half and sunk 140 miles west of the Cíes Isles. Up to this moment (February, 2003), official estimates indicate that the tanker has spilled in the neighbourhood of 30,000 tons of fuel oil

On the weekend of the 16th and 17th, before the ship sank, the “Costa da Morte” suffered the first oil slick, which affected approximately 200 km. of coastline, between Finisterre and A Coruña. After that, the oil slick continued incessantly to hit different points on the coast of Galicia.

Besides the Costa da Morte, the slick extended toward the south, reaching the Islas Atlánticas National Park which serves as a protective wall for the rías of Arosa, Pontevedra and Vigo. In subsequent weeks fuel oil continued to reach the coasts (Map 2), and the change in the direction of the prevailing winds brought the oil spills to the coast of Cantabria and even Brittany, in France. In addition, from the tanks of the submerged vessel, at a depth of 3,600 metres, fuel oil slicks have continued to appear on the surface, maintaining the threat several months after the catastrophe first occurred.

Map 2
Successive Prestige Oil Slicks



Source: “La Voz de Galicia-Los héroes del 13-N” p.12

This story is the terrible and visible consequence of the fact that seventy percent of hydrocarbon traffic to central and northern Europe is obliged to pass through the shipping corridor of Finisterre (COM 2000) (Map 1). The law of probability is inexorable and the coast of Galicia has received more than ten per cent of the world’s maritime oil spills.

Consequently, due both to the geographical location of the areas involved and to the cross-frontier range of the effects, we face a problem of European scope, and thus we will focus below on describing the economic vision of these effects and how they fit into the currently European legislative framework, closing with some thoughts on the future.

2. The economic vision of the effects

The economic effects of an oil slick go beyond the obvious. Specifically, environmental economy considers as losses all the loss in terms of welfare resulting from the spill. This, which at first sight seems reasonable, brings with it a broader vision than that which is allowed for in the processes for compensations and in the institutional framework now in force.

In the first place, the work of cleaning and restoration of the areas affected by the fuel oil have costs that are clear and immediate, which are habitually accepted by governments and paid for with public funds. In the second place, the groups of people who suffer the most evident consequences are those who make their living directly from the affected resource, in other words the sectors of fishing, shellfish production, aquaculture and tourism (including hotels and restaurants). In addition there are indirect effects on sectors that are dependent on those cited above or on the brand image of the resource. This group includes processing, transport, distribution, shipbuilding, etc. Finally, we have the loss of benefits that cannot be dealt with in terms of market values, such as benefits for the population in recreational resources and landscape, as well as for the cultural and natural values provided by the natural heritage.

Among the effects we have described we can distinguish those that are easily justified and, as we will see, eligible for compensation under current regulations. These are effects relating to cleaning and to the cessation of harvesting and, consequently, of income for directly affected groups (fisheries, shellfish harvesting and tourism). In the case of the Erika, in the year 1999, this damage amounted to 840 million euros, with a fishery and shellfish sector that was not comparable to that of Galicia (CES de la Loire, 2000). In the case of the Exxon Valdez, ten years before, the cost of cleaning work alone amounted to 2,100 million euros (Exxon Valdez Oil Spill Trustee Council). In the case of the Prestige, the government estimates that costs in cleaning alone – up to the moment – have reached 1,000 million euros.

Subsequently there are damages that are quantifiable but at present not subject to compensation in the framework of European legislation. These damages are consequences of the expansionary effect of the paralysis of the harvesting sector on processing, transport and marketing sectors, but are also related to the damaged natural heritage. This natural heritage, particularly rich in biodiversity and ecosystems in the case of Galicia, provides use values, such as the enjoyment of the landscape and recreational activities in nature areas, that either cease to exist or are left with lower levels of use and benefit. But there also exist values of a cultural or ecological character that are not related to the active use of the damaged natural areas but rather with the intrinsic value that they have as a heritage that belongs to everyone, as public goods. The maintenance of the coastline, its biological wealth and the beauty of its landscape, is a heritage that belongs to everyone, and as such, we all suffer when it is threatened.

The evaluation of damages caused by the Exxon Valdez incident, done in the early 90s in the United States, was a pioneer in including the loss of collective values in the figures for damages resulting from the accident. Thus, solely on the basis of this criterion for damages, the Exxon oil company agreed to pay 1,000 million euros which were invested in the financing of evaluation studies and restoration programmes – on both state and local levels – aimed at returning the damaged ecosystems to conditions as close as possible to those prevailing before the accident. And this was necessary for a spill involving petroleum, which is less pollutant than heavy fuel oil, and consisting of less than half the number of tons than in the case of the Prestige.

The philosophy that supports the protection of the public benefits of the natural heritage takes as its starting point the idea that the governments of affected member countries and European institutions should function as defenders and protectors of collective goods. These goods, given their public nature, form a type of resource with social value but without market price, which implies that losses suffered by them would not be justifiably liable to compensation as would those resources that are bought and sold on the market. Hence it is necessary to assess their value using a different sort of methodology, and public institutions must act as caretakers or administrators – not as owners - of a heritage that was handed down to present generations and that should be handed down, in the best possible state of conservation, to future generations.

The precedent has been set. All that is left now is for these value to acquire sufficient weight in the public mind to be covered by and incorporated into legislations which pose the framework for compensations for pollution. Nonetheless, as we will see below, this situation, which is to be

desired, is far from the institutional reality of our immediate surroundings: environmental liability within the framework of the European Union.

3. Current institutional framework in the European Union

The institutional framework in force in the European Union is anachronistically limited. Normally the ship owner limits the liability stipulated in the insurance contract depending on the tonnage of the vessel used for transport. Thus at present the maximum liability is 180 million euros, but this considers together the amounts established by the insurer of the vessel and the IOPC Funds or The International Oil Pollution Compensation Funds¹. This fund was created in 1992 by 74 states, under the auspices of the IMO (International Maritime Organisation) and is endowed with contributions from companies receiving hydrocarbons, normally oil companies. Its objective is to supplement the funds paid by the ship's insurer, in the event that these funds are not sufficient to cover the damage sustained².

The items eligible for compensation, both from the insurer and from the IOPC Funds, following justification through invoices or bank statements, are the costs resulting from the work of cleaning and losses in fishing, shellfish harvesting and tourism (IOPC Funds, 2002). It is worth noting, at this point, that just the cost of cleaning work, as estimated by the Spanish government up to this time, amounts to 1,000 million euros.

Given the above, it is clear that responsibility in Europe for oil spills occurring in maritime transport is not only limited but also unclear. The intervention of the fund implies that in fact it is the petroleum sector as a whole that meets the cost of the damage caused by the spills, diffusing liability so that the proportional part of the compensation paid by the party that is directly and genuinely responsible is ridiculous in comparison with the damage caused. For example, payments made by IOPC Funds in compensations for 120 incidents in which it intervened are estimated at approximately 63 million euros (IOPC Funds, 2002).

¹ The fund's contribution is expected to be increased to 270 million euros on November 1, 2003.

² In general, the usual procedure is that the IOPC Funds and the insurer open jointly run offices to handle claims for compensation when an accident occurs.

In contrast, as a result of the 1989 Exxon Valdez oil tanker accident off the coast of Alaska, in 1990 the United States passed the Oil Pollution Act (OPA). This legislation has a bearing on the principles of clear and unlimited liability, since it establishes that there is no limit to liability in case of accident. Ship owners must provide a guarantee of 1,000 million euros and, in addition, name a representative in their territory from whom civil liability can be claimed in case of accident. As an indicator that the polluter must pay, and pay a lot – taking this as the most effective instrument of prevention – there have not been any more oil spillages of these dimensions on the coasts of the United States. It is at the moment of contracting an unlimited insurance policy for navigation in its waters when the ship owner has to show that his vessel, inspection, crew, cargo, course etc. comply with maximum – not minimum – safety standards. If they do not, the cost of the policy will be very high.

4. The future

With the Erika accident off the coast of France in 1999, the European Union began to prepare new packages of regulations designed to improve maritime safety in the European Atlantic corridor. From these efforts there emerged the ERIKA I and ERIKA II measures. The ERIKA I package was approved by the EU in December, 2001, and should be integrated into the internal regulations of the member states in June, 2003, at the latest. This new legislation covers increased inspections on vessels, new requisites for the authorisation of classification societies and the requirement for the double hull on oil tankers from the year 2015. However, it does not establish measures for clarifying and extending the liability of the polluter.

This latter question is dealt with in the ERIKA II package. It covers the creation of the Maritime Safety Agency, and the coming into force of new automatic systems of maritime traffic control. In addition, it proposes to endow a fund for compensations (the COPE Fund) with 1,000 million euros (proposal for Regulation 2000/0326 COD). The first two measures were approved in June, 2002.

Nonetheless, with regard to compensations the European Union, in accordance with the Council of Copenhagen (COM 2002), is waiting for IOPC Funds to increase its current liability limit in May of 2003, in the belief that an international framework is the most appropriate way to deal

with this question; and in the event that this increase does not reach the expected objectives, the EU will consider the creation of its own system of liability and compensation.

The consideration that emerges is that the European Union's response to accidents with spills is much less firm than that of the United States, giving up a unilateral strategy that affects the polluter's liability. Under no circumstances, even in the most optimistic view of prospects for community legislation is liability unlimited – though it is considerably increased – and the system continues to dilute liability in a joint fund, the only difference being that it will be funded internationally if IOPC Funds ends up as the option and by European oil companies if it is finally decided to create the COPE Fund. And this in contrast to what was established by the European Commission itself in the White Paper on Environmental Liability (COM 2000), which recognises that the figure of the fund is in conflict with the “polluter pays” principle and also does not create efficient incentives for prevention.

The safety policy that can be perceived in the ERIKA packages is no more than a reflection of the Union's interest in remaining within a system backed by the International Maritime Organisation, which appears to be working to establish a balance between increasing the fund to the extent necessary in order to meet the demands of the affected parties, but not enough to avoid oil accidents entering into oil companies' calculations as an acceptable cost of their activity. In this sense, the EU's maritime safety policy initially favours the powerful oil lobbies and companies connected with hydrocarbon traffic.

The position of the European Union with regard to the ERIKA packages is consistent with the position defended within the Commission as the “Proposal for a Directive on Environmental Liability with regard to the prevention and remedying of environmental damage” (2002/0021 COD). This proposal for a directive explicitly excludes all “[...] civil liability for oil pollution damage” (Art. 3.3.). This position is also the result of accepting suggestions contributed by interested parties in the round of consultations prior to the drafting of the directive, in which companies and those affected by accidents were unequally represented. Thus the EU itself incorporates the opinions of the *International Maritime Committee* (London), *International Association of Independent Tanker Owners* (Oslo), *International Association of Oil and Gas Producers* (Brussels), *International Oil Pollution Compensation Fund* (London), *International Tanker Owners Pollution Federation Ltd.* (London) and *Oil Companies International Marine Forum* (London). These business groups consistently call on the EU not to include anything

relating to maritime transport of hydrocarbons in the directive for environmental liability “ [...] that would conflict with or affect existing regulations on liability and compensation” and insist that this system provides “reasonable” but never complete or total compensations for the damaged caused³.

5. Conclusions

1. In the adoption of the ERIKA I and ERIKA II packages and in the preparation and passage of the Directive for Environmental Liability we find an attempt to postpone the most effective solution to the problem. From an economic point of view adequate incentives ought to be introduced to make accident prevention the best policy for the companies involved. To do that it would be necessary:

- To base all measures on the “polluter pays” principle. This implies clarifying and personalising civil liability and going beyond the strategy based on collective funds. And, along the same line, going more deeply into this principle in the direction of a genuine unlimited liability. In other words, all damages are paid for, which would act as a real deterrent and would consequently make prevention the most viable company strategy.
- To open up a new framework for environmental liability on a European level, one which would consider that public goods require more and better governmental protection, since the market does not provide loss indicators or correct incentives for their conservation.

2. If, in spite of prevention, catastrophes like that of the Prestige occur, the economic analysis must necessarily confront two tasks: to evaluate damage and to propose programs for economic and environmental recovery.

- The task of evaluating the damage is complex but necessary. Complex because it must refer not just to goods and services that are the object of transactions on the market (fishing and shellfish products, tourism etc. insofar as they are affected, in addition to cleaning costs) but also to benefits citizens receive without the intervention of

³ <http://europa.eu.int/comm/environment/liability/wrkdoc.htm>

commercial transactions (recreation and enjoyment of landscape and nature) but whose alteration represents a loss of welfare. In addition, we must evaluate the change in the natural heritage, for which the economy has specific methods, such as contingent valuation.

This task is also necessary because it helps to determine the magnitude of the catastrophe and the liabilities, and will doubtless be information that is fundamental for the future process of political prevention programmes.

- The economy must also evaluate programmes for economic recovery of areas and sectors particularly affected. It is important, in this sense, that when they occur the resulting changes are measured correctly and the subsequent projects adequately evaluated, including projects for prevention and control of catastrophes.

Vigo, January, 2003

REFERENCES

COM, 2000. White Paper on Environmental Liability. Directorate General for the Environment, European Commission.

COM, 2002. Presidency conclusions. Copenhagen European Council. 12 and 13 December 2002.

Conseil Économique et Social des Pays de la Loire (2000). Les conséquences économiques et environnementales de la marée noire. Nantes, France
<http://www.cr-pays-de-la-loire.fr/institutions/publications>

Exxon Valdez Oil Spill Trustee Council
<http://www.oilspill.state.ak.us/gem/facts/quanda/html>

IOPC Funds (The International Oil Pollution Compensation Funds) 2002. "Claims Manual". London, Great Britain.
<http://www.iopcfund.org>