

# Revista Internacional

N.º 11

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**EMPRESA**  
**Mercantil de Pesca, L.<sup>da</sup>**

**FISH CANNING FACTORY**

**OLHÃO**

**Portugal**

IMPORT

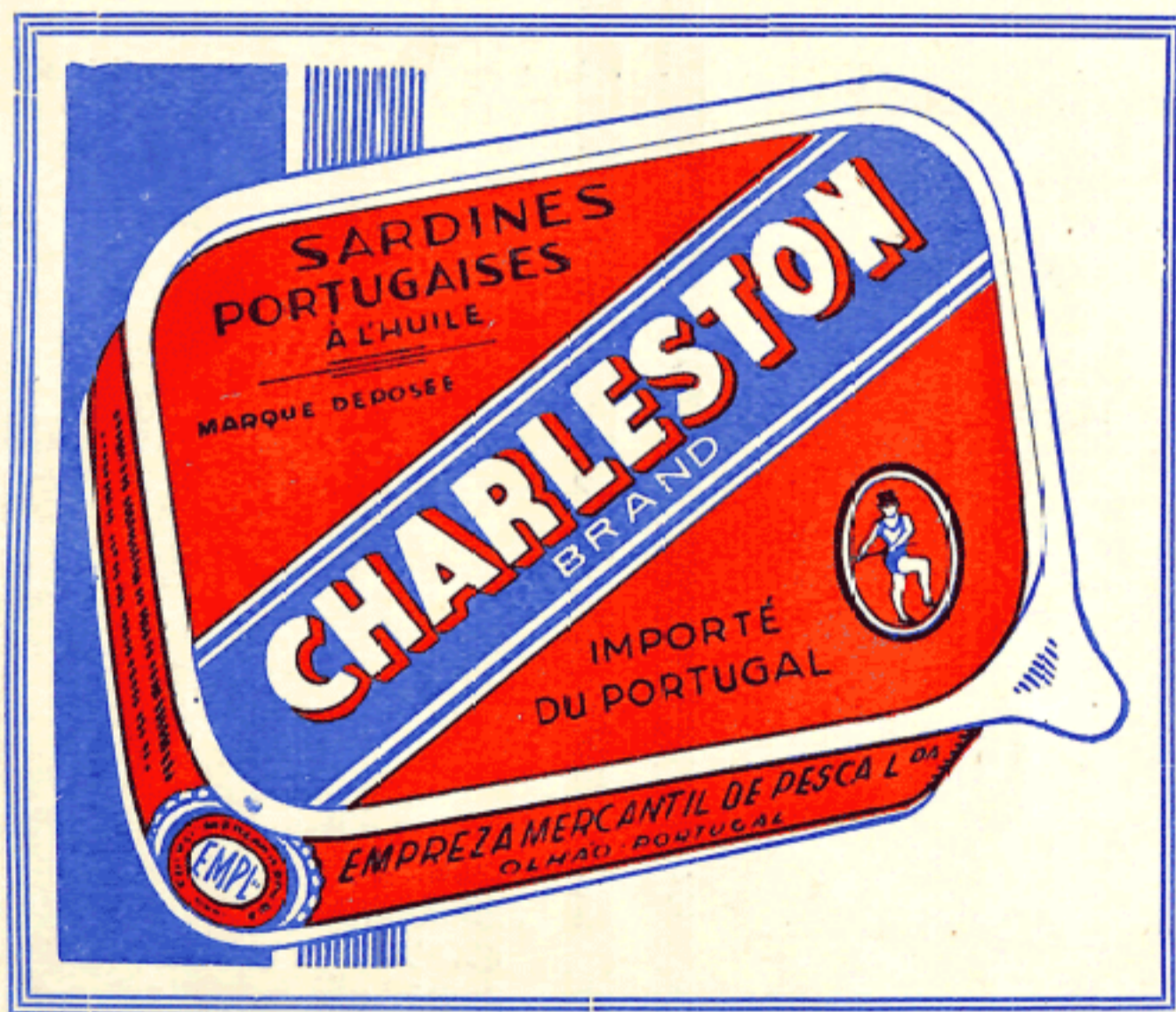
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BRANDS:**

**POLA**

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IN PURE  
OLIVE  
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E FICARÁ SATISFEITO...

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ESTAMPAGEM

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**Algarve — PORTIMÃO — Portugal**

SARDINES  
« A LA TOMATE »

SARDINES  
A LA PORTUGUESE

SARDINES  
BONELESS  
PLAIN—SKINLESS



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S E L E C T E D  
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I M P O R T  
E X P O R T

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**SUPER OMNIA PORTUGALIA  
ANNIE EAGLE**

Antole //



# SUMÁRIO

DO  
NÚMERO DEDICADO AOS E. U. DA AMÉRICA

EXPLICAÇÃO  
DINHEIRO... O NERVO DA  
GUERRA  
OS ESTADOS UNIDOS E A SUA  
CONSTITUIÇÃO  
PORTUGAL, DESCORRIDOR DA  
AMÉRICA  
O PRESIDENTE  
O ESPÓRÇO COMUM DAS AMÉ-  
RICAS  
A DEFESA CIVIL  
O DITADOR DA INDÚSTRIA  
CORDELL HULL  
OS CATÓLICOS AMERICANOS  
MAC-ARTHUR — O HOMEM DO  
MOMENTO  
GENERAL MARSHALL  
UM HOMEM QUE SABE DA  
GUERRA  
BOMBARDEIROS, SUBMARINOS,  
OS MERCANTES, AEROPOR-  
TOS PLUTUANTES, CAÇAS  
OS ESTADOS UNIDOS EM  
GUERRA

O ADIDO MILITAR EM LISBOA  
O ADIDO NAVAL EM LISBOA  
UM GRANDE POVO  
ANÁPOLIS  
OS FANTASMAS DA TÔRRE DE  
LONDRES  
O MINISTRO DOS ESTADOS  
UNIDOS EM LISBOA  
O HOMEM N.º 1 DOS ESTADOS  
UNIDOS  
O CÔNSUL GERAL DOS ESTA-  
DOS UNIDOS EM LISBOA  
OS PORTUGUESES NA AMÉ-  
RICA  
CRISTÓVÃO COLOMBO  
O ESTADOS UNIDOS DA AMÉ-  
RICA  
O ARSENAL DA LIBERDADE  
DOIS MILHÕES DE AVIADO-  
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General representative for U. S. A. A. E. RITTWAGEN, 99 Hudson Street Cables: Rittwagen — NEW-YORK



# THE FISHING AND CANNING INDUSTRY OF SARDINES

By D.<sup>r</sup> Francisco Guerra I. P. C. P. Delegate in the U. S. A.

(Transcrição do nosso colega *Conservas*).

and the entrails of the sardine. Even the great Horace, in one of his satires (Satire IV, Book II) makes a gastronome speak proudly of being the inventor of being the inventor of this sauce.

The sardine was fished them with leaves of wild beets or a kind of bait made with perfumed wine and myrrh.

• • •

**S**ARDINE is a Greek word — sardine — a diminutive of *sarda*, specie of tuna fish in the waters of Sardenha, from which the name derives.

Usually, the sardine is 17 cm. long and the shape of its body is elegant and offers to the eyesight a mixed color of blue and silver from its numerous and shiny scales.

Since the most remote epochs, the delicate taste of the sardine is highly appreciated. The Romans, good gourmets, knew how to make appetizing dishes with it. Apicicus left us the following recipe, which we mention for curiosity's sake:

Take out the bones of the sardine; then grind the cumin, grain pepper, mint, nuts with honey, mix well and boil.

Here is another recipe:

Wrap the sardine in a piece of paper and place it on the fire, seasoning it afterwards with olive oil, wine and anchovie sauce.

Another, yet, is:

Boil the sardine (boneless) and flavour it with pepper, lovage, thyme, origan, dates and honey. Then, serve in a dish with sliced eggs.

In those days, they had a sauce of great fame made with brine

This delicate and tasty little fish is very abundant along the entire coast of Portugal, which is exceptionally rich in animal life, as a result of the oceanic currents that pass close by, each one bringing its special fauna.

As Eliseu Reclus wrote in his *Nouvelle Geographie Universelle*, in 1875, there was so much fish in the waters of Setubal, a port south of Lisboa, that the Mediterranean and the Bay of Gascony were, in comparison, almost deserted.

Along the 860 km. of the Portuguese coast, there are to-day 60.000 laboring fishermen. This number, in proportion with the eight million inhabitants of the nation, shows clearly the importance of the fishing industry.

The Portuguese always felt a great attraction for the sea. The fishermen of to-day are the descendants of those who in the XIV Century, and in accordance with a treaty signed between the City of Lisbon and England, retained the fishing privileges on the English coasts, and, therefore, initiated the inhabitants of Great Britain's coast in the industries of the sea. The Portuguese fisherman are also the grandsons of those who, in the XV and XVI Centuries went to fish in Newfoundland and supplied a great part of Europe with salted fish and a sort of monopoly on the sales of codfish. They

are also the descendants of those famous navigators, as Diogo Teive, Pero Vasques de la Frontera and João Vaz Corte Real, who first set foot on American soil, in New Foundland, many years before Christopher Columbus arrived in America in 1492 — the first two in 1452 and the last in 1472, as is proven by the works of historical investigators.

At present, sardine fishing is done by various methods: — the circle, fishing boat, armação (stationary net). The last method has almost been discontinued.

In the northern part of the country most popular system is the fishing boat, in the central and southern part, the circle system predominates and is the most profitable in fishing, even if it is the most difficult.

The circle, to which is also given the name of «American Circle», is composed of a fishing net of light and uniform mesh, with a length that ranges from 800 to 900 meters and a width of 65 or 75 meters, according to the depth in which the fishing is done. The circle is maneuvered by a steamboat which pulls three or four boats.

Upon arrival at the fishing grounds and after sounding the depth of the water and the nature of the ground, the net is thrown into the sea and the steamboat makes a circle of 350 to 400 meters in diameter.

To maintain the net in a vertical position in the water, pieces of cork are attached at one extremity of the net and pieces of lead at the other.

With the help of the winch, a cable which runs through rings attached to the net, closes the bottom of the net, giving it the shape of a funnel or bag. This done, the bottom of the net, where the sardines are swimming, is pulled aboard with the help of the winch and the boats stand at the buoying cork-line of the net, ready for the catch.

As soon as the sardines are seen on the surface of the water, they are caught in small nets, shaped as a cone, called «net baskets», and thrown alive and jumping, inside of the boats.

The net of the fishing boat is smaller than that of the circle. The length is between 200 and 250 meters.

In the «armação» the net is placed in the bed of the sea, where the fish usually appear and is left there during the entire fishing season, which normally lasts some months of the year.

The dark nights are the best for fishings because the dark water shows, more brilliantly, the shiny silver of the scales of the sardines as if it were a phosphorescent matter, lighting the surface of the water.

Sometimes, the presence of the sardines is revealed by small bubbles of air that come to the surface of the sea, or by certain sea birds that follow, hungrily, the sardine school and dive into the water to catch them.

• • •

The quantity of sardine that may be caught, in one throw of the circle, very uncertain. As an average, it may be figured between one million and two million sardines, but, if it luckily happens that the throw of the net falls on a compact school of sardines, then 3 or 4 million may be caught.

It is extraordinary the way the sardine reproduces itself. Each sardine lays about 6000 eggs. The reproduction occurs on the coast of Portugal during the months of December, January and February; choosing the low banks of sand, the sardine then presses the ovaries against the sand to expel the eggs, which afterwards float on the water. To preserve the eggs, a certain salty condition of the water is necessary and, above all, the temperature should not be below 12 or above 15 degrees centigrades.

During the period of the spawn, the sardine is thin and, therefore, its fast, fattening qualities and commercial value, are inferior. The percentage of fat at this time is the lowest. In some cases, it is 0,80%. In the Spring, the sardine starts to get fat and usually reaches the maximum in the Autumn, attaining sometimes from 23% to 24%.

The sardine feeds on certain crustaceous «zooplankton», that in turn feed on extremely small plants and the «fitoplancton», which only live under the intense light of the sun. If the temperature is not warm enough, the fitoplancton disappears, the crustaceous or «zooplankton» also have a tendency to disappear and the sardines vanish to the deepest depths of the sea. This is one of the causes of the periodical crises of lack of sardines on the coast of Portugal, but there are also others, as, for instance, the temperature of the water, the change of currents from the Gulf Stream,

the direction and velocity of the wind and the restless pursuit by the fishing boats, etc.

When the sardine is born, it appears very small, without scales and the vertebrae can easily be seen through the delicate skin, but at the end of eight days, the aspect changes; it becomes round, the scales become visible and the flesh more solid.

During the first year of its growth, the sardine attains the average length of 11,6 cm., in the second year 15,9, in the third year 17,6 and then it grows gradually up to the sixth year, attaining then its full growth of 19,9 cm.

According to the theory of the French scientist, Le Danois, it is possible to know the age of a fish by the number of the striae of the scales examined with a microscope, in the same way that the age of a tree may be determined by the wood rings.

We have already described how the sardine is caught, how it is taken from the nets to the boats and towed at full speed to the places where it is sold. These methods furnish a clear picture of the freshness and exceptionally good condition of the fish when taken to the factories to be preserved and manufactured into a product of a superior quality.

• • •

**The Canning** — After a few hours of sailing during the night, the boats arrive finally in the early morning at the port where the sardines are sold in lots.

When the sale is completed, the contents of the boats are emptied into baskets that weigh, when full of sardines, about 40 k. and then carried and transported to the factories on the heads of the workers or by mechanical transports and trucks. When the sardines arrive at the factory, they are spread on tables where women cut the heads off with one blow and remove the entrails, separating at the same time, the small fish from the larger ones.

When this operation is ended, the sardine is given a bath of salt, remaining here for a required period of time, according to the size of the fish, in order to acquire taste, harden the flesh and give consistency to the scales.

When the sardines are taken out of the salty bath, they are spread again on tables and placed afterwards on grills of copper wire, in parallel ranks, to avoid contact with lead, and with the tail up on a decline of about 40 degrees.

Once the grills are full, the sardines are given a bath of pure running water which cleans them thoroughly.

If the type of canned sardines is to be made without skin or bones, the bones are taken out during this operation and the sardines replaced on the grills to be washed once more.

When this operation is finished, the grills are placed vertically on open iron cars with shelves and into ovens heated by steam where the sardines remain between 5 and 15 minutes in a temperature of 100° centigrades.

When the sardines are to be fried, the grills are dipped for three or four minutes in a caldron full of pure olive oil, heated at the temperature of 100 to 125° centigrades by the circulation of steam pipes.

After the sardines are cooked, they are dried in the open air or by means of electric dryers, then they are carried to the packing tables, still on the grills, from where they are taken by the women and placed in the cans. To manufacture the skinless and boneless type of canned sardines, the skin is taken at this time, but if it is to be only boneless, the bones are taken out now, and not at the time we mentioned before.

When the cans are filled with sardines, they are automatically filled with an exact quantity of pure olive oil without any waste. After this operation, the cans are taken to the sealing machines to be closed tightly and air-proof. These machines can close more than 2400 cans per hour.

The cans are then placed in iron baskets and put in retorts, also of iron, where they remain for a certain time, according to the size of the can to be sterilized at a temperature of 110 to 115 degrees centigrade.

The sterilizing operation is very important because it destroys the bacteria that is found in all products, and therefore preserves it against time and decomposition.

When the cans are sterilized, they are washed and dried by a machine at the same time, and then taken to the packing department where they were, they are inspected, one by one, and those with the smallest defect or imperfectly closed, are put aside. The rest are placed in boxes, ready to be exported to all parts of the world.

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By what we have described, you see that the sardines go into the factories in the morning, right after they are caught and very fresh, and in the afternoon of the same day, they are already preserved in cans filled with the finest olive oil, retaining all the properties of food value and the delicate taste of the fresh fish, much improved.

The International Congress for Curbing Frauds, which took place in Geneva in 1908, gave the name of 'preserve' to the food products that, by means of proper treatment, retained for a long time their most important qualities.

We can say that since the remotest time man has felt the necessity and importance of preserving food and stocking it for an occasion of need, as well as to transport it from one place to another. The preservation methods then employed changed, according to the climate and place where man lived. In the warm and mild countries, a drying process was used, and sometimes the smoked process. In the cold countries, the congelation method was used.

Other processes followed later for the preservation of food with salt, vinegar, olive oil and alcohol.

Until then, those operations were done in the open air and in open containers. Only in the beginning of the XIX Century, in 1809, with the discovery of the Frenchman Nicolas Appert, were the preserves prepared in containers, totally closed and under the heat action. Only then was the great industry of to-day, of prodigious development, initiated. In the productive field, it has attained now over 300 million cases of the most varied products.

Appert, with his discovery, proved that:

- 1st.) — Heat preserves food.
- 2nd.) — Air is prejudicial to preservation.

Yet, Appert did not know how to explain sterilization scientifically. In his report to the Academy of Sciences, he said that the result of the preservation was due to the *magic action of the fire*. The key to the riddle was given later, in the latter part of the XIX Century, by the great Pasteur, with his discovery of the micro-organisms.

It was Pasteur who demonstrated that the food enclosed by Appert, in glass containers, was protected against contact with germs carried by air, and germs existing previously by the action of the warm bath.

Appert preserved meat, fruits and vegetables, but the application of his method to sardines was used later, in 1882, at Nantes, by Joseph Colin, with tin containers already in use, instead of glass ones, used in the beginning by Appert.

The Portuguese canned fish industry started in Setubal on November 16, 1880. Taking advantage of the great lack of sardines in France, from the year 1880 to 1887, the Portuguese industry progressed rapidly, and six years later, in 1886, sixty-six factories flourished along the Portuguese coast.

The 1914-1918 World War gave a bigger increase to the industry extent that in 1924, 400 factories of canned fish existed in Portugal. But, the world economic crises that has been dragging for years, decreased this number gradually, reducing it to-day to half of what it was; in other words, to about 200 plants.

Nevertheless, Portugal to-day is yet much ahead of all the other competitor countries, and, therefore, the biggest exporter of the genuine canned sardines.

We emphasize the word *genuine* because there are other competitor industries that take advantage of the reputation of the name *sardine*, which is given scientifically and exclusively to the ichthologic species (*clupea pilchardus*) found only on the coasts of France. Spain and Portugal, to disguise, under this name, other inferior species of preserved fish.

Certainly, there are fish of the '*clupeidae*' family, to which the sardine belongs and has a close resemblance, but they are of a different specie, inferior in quality and with interior and exterior characteristics, which scientifically distinguish them easily from the authentic sardine.

The difference is noticeable in the shape of the body, color, dimensions and position of the fins, the size of the number of vertebrae, etc. Above all, in the taste of the meat, which has much more flavor and is more delicate than any of the other fishes.

It was proposed by Dr. Hubbs in 1929, at the Academy of

Sciences in California, that a new classification be created for those species, under the name of '*sardinops*'.

Based on that classification, the other species now called sardines would be named:

*Sardinops Coerulea* — found on the California coast.

*Sardinops Sagax* — found on the coasts of Peru and Chile.

*Sardinops Melanostica* — found on the Japanese coast.

*Sardinops Neopilchardus* — fished in the meridional coast of Australia and New Zealand.

*Sardina Pilchardus* or '*Clupea pilchardus*', should be given only to the specie found on the coasts of France, Spain and Portugal.

There are yet other fishes, as the sprat and the herring, the zoological classification of which is, respectively, '*clupea sprattus*' and '*clupea harengus*', to which the Norwegians give the name of '*brisling*' and '*sild*', and are placed in the market preserved in oil with the designation of sardine.

As a matter of fact, the genuine sardine is not found in the North Sea because the low temperature of the water makes it unfit for their life. Once, when two sardines were caught on the Norwegian coast, it was considered such an extraordinary phenomenon that the two fishes were taken to the Bergen Museum for exhibition!

Against the improper designation of '*sardine*', the French industrialists of canned sardines started legal action in the courts of varied countries, winning their law suits as it happened in France, in the Sena Court, on December 8, 1908; in Germany, in the Civil Court of Hamburg on November 6, 1913 and in England, in the Bow Street Court, on March 20, 1914.

In England, the '*Merchandise Marks Act*', of 1887, stated the following: '*the commercial denomination of sardine*', is legally reserved to the particular specie of fish designated in England by the name of '*pilchard*' and in France by the name of '*Sardine*'.

In Belgium, a few years ago, in 1932, the '*Syndicat National des Fabricants de Conserves de Sardines*' started a law suit, identical to the one described above, obtaining a verdict in their favor by the Commercial Court, on April 18 of that year, from which judgment we extract the following, that so well explains our statements on the matter:

'As the name '*sardine*' already in use in 1553, and applied by Cuvier, who called the fishes caught in France, '*Clupea Sardines*', was adopted by the French since the beginning of their industry in 1882, to denominate the fish caught in her waters and preserved in cans, foreign manufacturers were not allowed to use the name '*sardine*' for the designation of similar products, preserved in cans, as done by the processes of the French industries of fish of another specie, thus provoking a confusion of the nature of products offered to the public.'

In the countries we have just mentioned, canned sardines can only be sold if manufactured in France, Spain and Portugal.

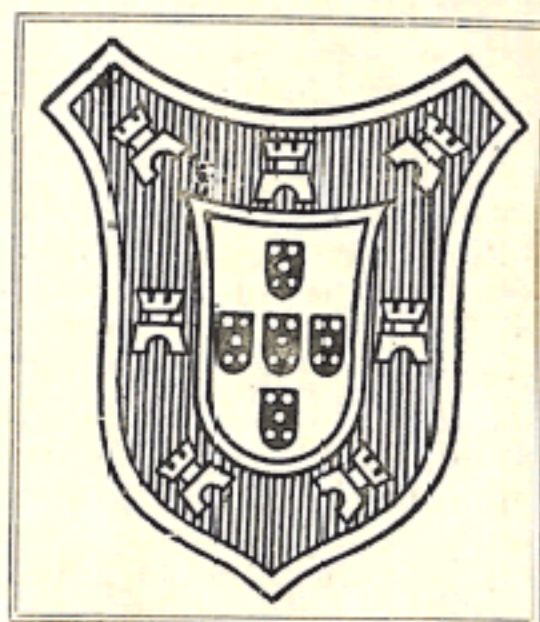
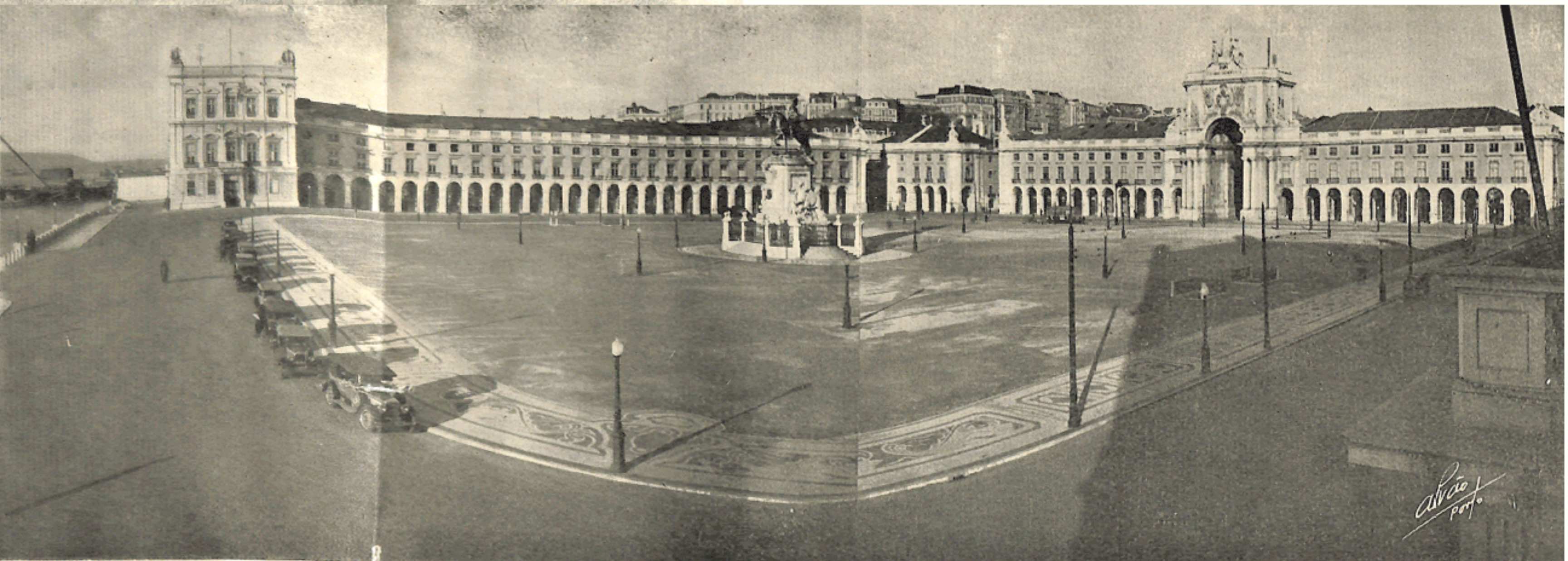
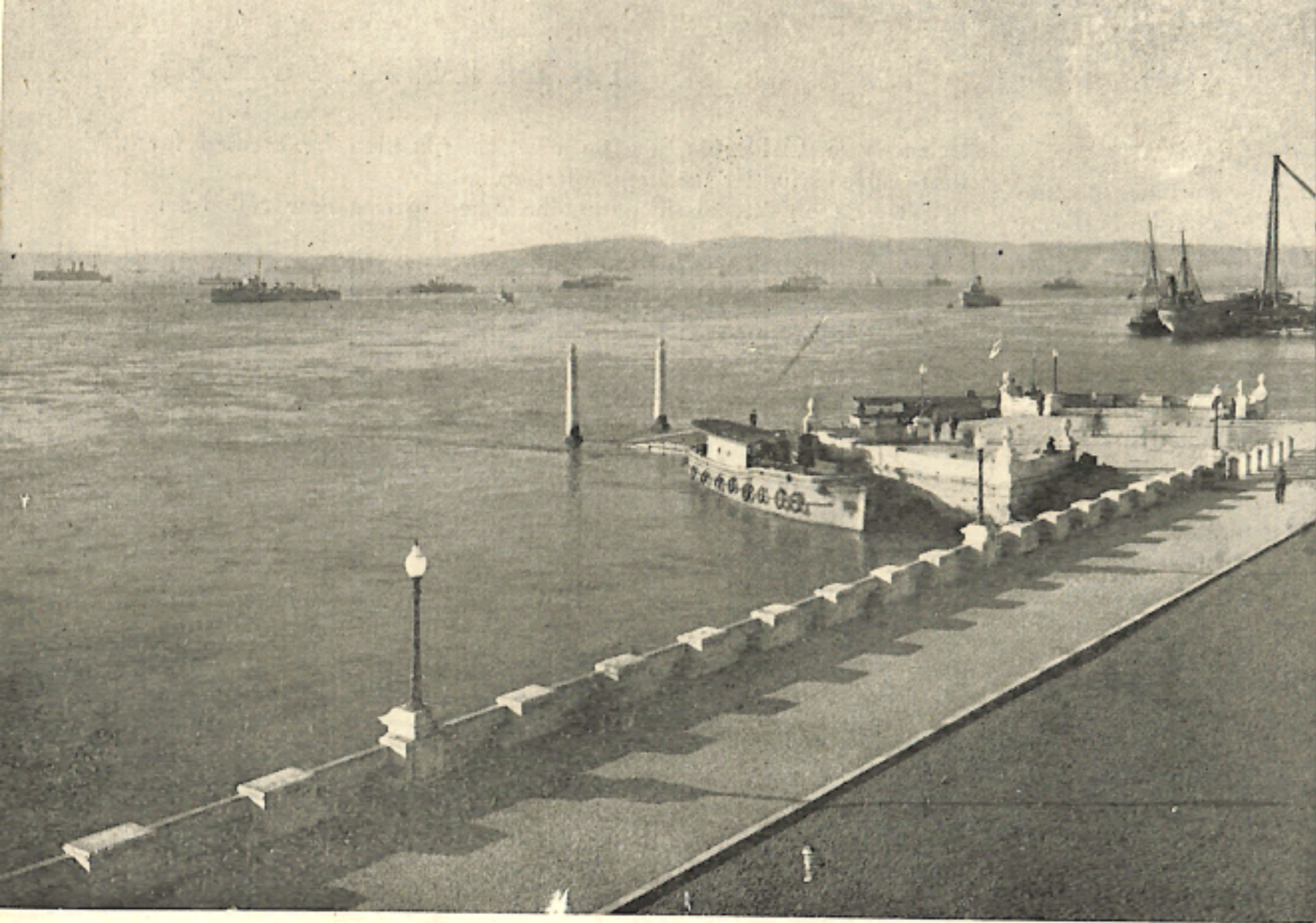
In the United States of America, for reasons easily understood, and tending to benefit her industry, it was allowed by the '*Pure Food Law*' of 1906, that all the small '*clupeideos*' preserved in cans, may be labelled as sardines. This decision was not achieved without protests of reputed American scientists. No fish can be called '*sardine*', simply because it is prepared in the same way that the sardine is.

The Portuguese industry of preserved fish exports annually, to all the markets in the world, almost an average of two million cases or two hundred million cans, which shows the appreciation of the consumer for the quality and nutritious properties of the sardine.

Food to-day is going through a revolution. The dynamic modern way of life has resulted in the discard of food of slow cooking. On the other hand, the consumer's idea regarding food, changes gradually. He does not prefer it for its taste or its appealing qualities, but especially for its scientific food value.

In both cases, the Portuguese sardine occupies a privileged place for its practical usefulness and energetic elements of its contents: fat, proteins, mineral salts and vitamins, which are indispensable to the normal function of the human organism and which make the canned sardine a perfect food product.

The Laboratory of the Portuguese Institute of Canned Fish, after a complete study, found in the sardines the following food elements, all very important to physiological nutrition: carbon,



**G**EOGRAPHICALLY, Portugal occupies the position of being the nearest part of Europe's mainland to both North and South America, and consequently can be considered a most adequate natural entrepôt for the traffic between the two Continents. Already for years, Lisbon has been used as the last European port of call for the majority of steamers navigating the Atlantic Ocean from east to west and from north to south, and in addition to its situation, much has contributed for this, its splendid and large natural harbour, sufficiently deep for the largest ships in the world to drop anchor there. With the recent international developments this

## Portugal's Unrivalled Position

unique situation has been more accentuated, and now Lisbon can be considered the last safe port of destination in Europe where vessels from the Americas can call. Goods and passengers arriving in Lisbon can proceed from there to the other European countries by sea, rail or air, still with relative facility.

Portugal, by having maintained strict neutrality, is respected by all the belligerents, and the Portuguese coast is free from the dangers which abound along the other European coasts on account of the present war.

With the invasion of the German troops and the consequent annexation of different countries, Portugal became the gathering centre of refugees from Poland, Tchecho-Slovakia, Scandinavia, Holland, Belgium and France, who arrived here in thousands, and this Country received them all without distinction.

From here many thousands, after a certain delay to get their affairs in order and to make the necessary arrangements, followed on, both to North and to South America, but, nevertheless, still many thousands are here and probably will remain here until they are able to return to their own countries after cessation of hostilities. Many will probably not wish to return to their countries, because they are settling down to a new sphere of life and building up new homes and businesses in a peaceful Country, where, at any rate for the moment, there is no lack of foodstuffs and where life is comparatively cheap, due to a certain extent to the lower standard of living of the Portuguese people and to the relatively poor financial resources of the Country.

With the uncertainty of sea communications and the temporary dangers involved in travelling by sea, air communications are more and more increasing, and at the present moment the greatest part of travelling between the Americas and Europe and between Africa and Europe is being done by air.

For this traffic, Lisbon affords the best arrival and departure station in Europe. From Lisbon there are frequent air services both ways to North and South America and to Africa, as well as to Spain, Italy, Germany and England.

The Pan American Airways, which has been bridging the Atlantic between Portugal and the United States for two years, has recently inaugurated on the westbound service—but only during the winter months, in order to correspond to the prevailing wind currents—the itinerary calling at Bolama (Portuguese Guinea), Por-of-Spain (Trinidad) and San Juan (Puerto Rico), thus transfor-

ming the there-and-back journey from the States to Europe into a gigantic clockwise tour, which follows approximately the clockwise movement of the prevailing wind currents. On the outbound trips from New York to Lisbon, the clippers have been generally favoured with the west winds, but the homeward bound clippers have heretofore had to carry very much more fuel to cover the same distance fighting against the winds, and the schedules have often been impaired.

By following the new route to Bolama and across to Trinidad, they now escape the heavy battle against the wind currents, and in consequence thereof, make a decided cut on the fuel bill and can keep more definitely to the schedule.

Furthermore, the Companhia Colonial de Navegação, an important Portuguese shipping company, has completed plans to open an imperial air route to link up the continent with the Portuguese Colonies of Angola and Mozambique in Africa. For the inauguration of this service, the company in reference is only awaiting the final sanction of the Portuguese Government, as the application has already been considered by the Civil Air Commission, and, if such is the case, it is hoped to start operations, using Douglas transports, within a few months.

This service will be of immense value to the great movement of business men and Government officials between these Portuguese Colonies and the Motherland, as, heretofore, the journey took long weeks from end to end.

The proposed route to be followed is:—Lisbon to Tangier, thence to Colomb-Bechar in Western Algeria and south Luanda (Angola), making stops at Gao, Niamey, Duala and Port Gentil. From Luanda, the service would bear east across the continent to Lourenço Marques (Mozambique), with stops at Teixeira de Sousa, Elizabethville, Tete and Beira. Furthermore, a branch line would link Angola to the Island of S. Tomé, while a seaplane service is also under consideration to connect up Guinea with Madeira and the Cape Verde Islands. Army planes, also, have already surveyed a triangular route to serve Lisbon, the Azores and Madeira. It will be remembered that the Portuguese were the first to effect the crossing of the South Atlantic by air, when in 1922 Admiral Gago Coutinho and Commander Sacadura Cabral flew from Lisbon to Rio de Janeiro.

The regular air traffic on this route, however, has been carried out by German and Italian companies, but it is hoped eventually to have an all-Portuguese service operating this trip, because, although Brazil is now independent, this one-time Portuguese Colony has never really lost its love for the Country that gave it its civilisation and culture.

The airport of Lisbon is at Sintra, and there, the doors of the German Lufthansa, the Italian Ala Littoria, the British Overseas Airways and the Spanish and Portuguese companies open out into the same saloon.

At Cabo Ruivo is the seaplane station where the Pan American and the British Overseas Airways use the same facilities.

Although the war is the chief cause of the increasing use of Lisbon as a stopping-place for all these air services, such facilities will automatically become

**P**ELA sua situação geográfica, Portugal é a parte do continente europeu mais próxima das duas Américas e, por conseguinte, pode ser considerado o entreposto mais naturalmente adequado para o tráfego entre os dois Continentes. Já desde há anos, Lisboa tem sido utilizada como o último porto de escala pela maioria dos vapores que cruzam o Atlântico de leste a oeste e de norte a sul, para o que muito tem contribuído, além da sua situação geográfica, o seu esplêndido e grande porto natural, que dispõe de profundidade suficiente para os maiores vapores do mundo poderem ancorar.

Com os recentes acontecimentos internacionais, esta situação única cada vez mais se tem acentuado, e Lisboa pode actualmente ser considerado o último porto de destino seguro na Europa que os vapores das Américas podem demandar.

Mercadorias e passageiros chegados a Lisboa podem seguir dali para todos os outros países europeus por mar, por caminho de ferro ou por ar, ainda com relativa facilidade.

Portugal, por ter mantido uma estrita neutralidade, é respeitado por todos os beligerantes, e a costa portuguesa está livre de perigos que abundam nas outras costas europeias por causa da guerra actual.

Com a invasão das tropas alemãs e a anexação de diferentes países, Portugal veio a ser o centro de encontro de refugiados da Polónia, da Tchechoslováquia, da Escandinávia, da Holanda, da Bélgica e da França, os quais chegaram aos milhares, e todos, sem distinção, foram recebidos neste País.

Daqui, muitos milhares destes refugiados, depois dum certo demora para porem as suas cousas em ordem e fazerem os arranjos necessários, seguiram para a América, tanto do Norte como do Sul. Apesar disto, porém, muitos milhares ainda se conservam aqui e provavelmente ficarão até terem a possibilidade de regressar aos respectivos países, depois de cessarem as hostilidades.

Muitos, provavelmente, não quererão voltar aos seus países, porque estão a adaptar-se a uma nova esfera de vida e a construir novos lares e novos negócios num País pacífico, onde, pelo menos de momento, não faltam géneros alimentícios e onde a vida é relativamente barata.

Com a incerteza das ligações marítimas e os perigos que presentemente oferecem as viagens por mar, aumentam cada vez mais as comunicações aéreas, fazendo-se neste momento por ar a maior parte das viagens entre as Américas e a Europa e entre a África e a Europa. Para este tráfego, Lisboa constitui a melhor estação de partida e de chegada na Europa.

consolidated after the war, because the time saved by travelling by air and the ever increasing safety of such travelling will be the great inducement in the future for greater movement both in postal and passenger services, and probably will eventually cause such services to be extended to the transport of goods by air on long distance journeys.

Thus, taking all these points into consideration, no place enjoys such a privileged position as Portugal to become the great international junction of Europe, and to this must be added the undeniable utility of the Atlantic stepping-stones, the Portuguese Islands of the Azores and Cape Verde.

EDWARD W. ROBERTSON.

hydrogen, oxygen, nitrogen, phosphorous, sulphur, chloro, silico, sodium, potassium, calcium, magnesia, iron, manganese, zinc, copper, fluorine, borated bromo, arsenic and iodine, which in the opinion of many scientists, is the best remedy for gout.

The Portuguese canned sardines contain 5 vitamins: A and B, the vitamins for growth; D, the vitamin of reproduction; P, the anti-plague vitamin and C, the vitamin anti-scorbutic, when the canning is done with tomato sauce.

It was believed that the high temperature, to which the preserves are submitted, destroyed the vitamins. This supposition was a mistake. To-day, it has been proven, beyond any doubt, that the vitamins are more sensitive to oxidation than to heat, and, thus, they are preserved when they are submitted to high temperature in a container hermetically sealed and are easily destroyed when, according to the process of classic cooking, the food is heated in contact with the air.

Before knowing the specific value of the vitamins and that they existed in fish, Cuvier, a great naturalist of the last Century, already said: "Do not be afraid of eating plenty of fish because this food will give you complete physical and mental strength, up to old age."

We could mention here thousands of declarations of famous scientists of all times, proving the nutritious value of fish.

It is enough to state that the importance of the sardine, as a food and above all as a medicine, was highly appreciated amongst Greeks and Romans, and, as an example, I will relate a few very curious instances:

Discorides, pupil of Plinio, said that fish in oil, applied to a wound made by a mad dog, is an excellent remedy. Discorides and Celso advised as a preventive cure for teeth decay, rubbing the teeth with the head of a "dog-fish", boiled in oil.

Plinio offers a series of hygienic and sanitary prescriptions for women. If she suffers from hysteria, a linen cloth, soaked in the hot fat of dophio, applied to the forehead, is a good sedative. If an easy parturition is desired, it is enough to introduce in the patient's room an electric rayfish, caught at the moment when the moon is in the constellation of the Lyvre, and exposed to the air during three days. To prevent baldness, the old doctors prescribed the blood and liver of tuna fish, fresh or in oil.

Leaving behind those curiosities of older times and coming back to the Portuguese canned sardines, we have yet to verify and present the superiority of its food value, in relation to other foods considered important.

Thus, for instance, while the canned sardines supply 372 calories per 100 grams, the roast-beef only supplies 347, wheat bread 259, corned-beef 209, eggs 148, milk 67, and oranges 51 calories.

If we compare a slice of veal with a can of sardines of the same weight, 158,98 grs., we verify the following:

	A slice of veal	Contents of 1 can of sardines
Calories . . . . .	298,25	711,10
Water . . . . .	112,72 grs.	71,07 grs.
Fat . . . . .	17,89 "	61,44 "
Aluminum . . . . .	27,03 "	29,22 "
Mineral Salts . . . . .	1,36 "	7,25 "

In conclusion, it means that the contents of a can of sardines has a superior food value, compared with a slice of veal of the same weight, and the power of its calories is two and a half times superior; the percentage of fat is four times as great, that of minerals also four times greater and its richness in albuminoids' material is much superior.

As for digesting, fish meat is considered the best and first by hygienists. Following, is the fowl's meat, crustaceos, lamb, veal, cow, sheep and, lastly, pork. If the meat of these animals is eaten too frequently, it irritates and disturbs the human organism because it creates too much acid and results in the intoxication of the organs, this never happening with fish meat.

The Portuguese industry of canned fish gives to the consumer the guaranty of the quality of its products, more than any other industry of this nature, due to the virtues of its modern system and organization. The Portuguese Government, through its special Department, the Portuguese Institute of Canned Fish, inspects and checks all productions. The manufacture of canned sardines is carried on only during certain seasons of the year, when the fish is fat and in perfect condition.

Not a single can is exported until the quality of its contents has been checked before shipment; the statements on the can referring to the contents, its weight and shape, are also checked with the official requirements. The laboratory, in scientific cooperation with the industry, analyzes the fish, the olive oil, the tin and other products, in order that the canned sardines may satisfy all the requirements demanded by technique and hygiene.

The fish, canned by the Portuguese industry, are of many species and so are the ways of its manufacture. There are the sardines with bones, the skinless and bonelless, with lemon, pickles, boiled in olive oil, or in tomato sauce, salted and pressed; there is the tuna-fish, the tunny, the "sarrajao", the small tuna in olive oil or brine. There are the "biqueirao" of anchovies in olive oil or brine; the mackerel in fillets, boiled or whole in brine. There are the bogue and the chinchard in olive oil and also squid and "berbigao", (sort of mussels).

But, above all these different types of fish is the sardine, for what it represents in importance to our national and economic life, by its export value or consume by the public — "fresh and jumping", as the people say, a fish of incomparable and delicate flavor, small, elegant and shining as leaves of silver; THE SARDINE. And it is probably on account of this, that a famous Portuguese writer said in a happy and humorous vein: "Portugal will never die, as long as she has women and sardines!"

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# O Mercado

## Norte-Americano

### e a nossa indústria de conservas de peixe no ano de 1940

Pelo Dr. Francisco Guerra,  
Delegado do I. P. C. P. nos  
E. U. da América.

**A**s perspectivas da nossa exportação, no ano de 1940, para os Estados Unidos, eram, na opinião de muitos, as mais favoráveis, visto que o nosso principal e, praticamente, o único, concorrente, a Noruega, tinha sido eliminado pela invasão alemã. De facto, logo nos primeiros meses do ano registou-se um apreciável acréscimo nas encomendas dos fabricos com espinha, sobretudo no novo formato 1/4 reduzido 21 mm., empapelado segundo o sistema norueguês, e os importadores aguardavam o acolhimento que o consumidor lhe reservava para, no caso de ser favorável, passarem novas e mais avultadas ordens.

Porém, muitos e variados factores que sobrevieram no decorrer do tempo,

uns imprevistos, outros dentro da lógica do mercado, vieram transtornar os cálculos mais optimistas, do que resultou que a nossa exportação para a América do Norte, embora tenha aumentado sensivelmente em relação aos anos transactos, não atingiu aquela cifra que a princípio se supôs.

Em primeiro lugar, o câmbio do dólar, que chegou a atingir, em Maio, Esc. 31\$00, e em volta desta base se fizeram os contratos para as novas encomendas a fabricar, baixou nos princípios de Junho para Esc. 27\$00, e veio descendo, gradualmente, até Esc. 25\$00, em que hoje está. Os exportadores portugueses que venderam em dólares, encontraram-se, quasi repentinamente, com um prejuízo de 20 % sobre o valor das mercadorias vendidas, e esquivaram-se à sua entrega, e aquêles que tinham vendido em escudos, e a quem a baixa do dólar não tinha atingido e queriam entregar as suas mercadorias, viram-se, por outro lado, perante a recusa dos compradores em as receber, porque tinham que pagar mais dólares pelos mesmos escudos. Resultado: as encomendas, na sua quasi totalidade, não foram executadas.

Por outro lado, foi um erro supôr que o consumidor americano ao notar a falta das conservas norueguesas no mercado, se voltaria, automaticamente, para as conservas portuguesas.

O povo americano está muito habituado às características do «brising» e do «sild» noruegueses, que prefere a outros peixes pelo seu tamanho, que permite



moules de 8/10 até 30/40 no formato 1/4 22 mm., o que é duma grande vantagem para a distribuição numa família, e também pelo seu sabor a fumo. Compreende-se, portanto, a impossibilidade de o fazer transitar, rapidamente, em massa para a compra das nossas sardinhas, que possuem características diferentes, sem ter sido previamente educado e preparado para isso segundo o «processus» americano, isto é, através duma propaganda em que as vantagens dos nossos produtos fôsem apregoadas.

Acresce que uma existência relativamente importante de conservas norueguesas, de que se tinha feito uma importação excepcionalmente avultada antes da invasão da Noruega, pesou no mercado durante quasi todo o ano diminuindo o interesse pela sardinha portuguesa.

Além disto, as cotações sucessivamente mais altas das nossas conservas, motivado pelos preços continuamente elevados da pesca, dos materiais de fabricação e da mão de obra, cavavam um desnível cada vez mais profundo entre o mercado português e americano, que não podia, nem queria, sujeitar-se aos preços que os países em guerra aceitam, pela facilidade que tem em encontrar dentro das suas fronteiras, em grande abundância, tudo o que precisa para a sua alimentação.

Houve um momento, de nervosismo nas ofertas, em que os importadores se convenceram que os preços baixariam para 50 %, supondo que Portugal não teria outro comprador para a sua produção senão os Estados Unidos.

A seqüência dos factos mostrou-lhes que se enganavam, e, em certa altura, já tardiamente, tomaram a resolução de comprar os stocks que encontraram disponíveis em Portugal, sobretudo fabricos de especialidade, porque os normais eram excessivamente caros para as condições do mercado.

Apesar de tôdas as dificuldades que enumeramos, o volume das nossas exportações para a América do Norte em 1940 aumentou consideravelmente, em relação aos dois anos anteriores, como se verifica pelo quadro seguinte, em que damos o total geral das exportações e especificamos só as sardinhas e as anchovas em azeite, que são os fabricos que mais interessa confrontar:

1938	
Total geral . . . . .	2.036.469 kg.
Sardinhas . . . . .	1.753.204 kg.
Anchovas . . . . .	26.281 kg.
1939	
Total geral . . . . .	4.163.887 kg.
Sardinhas . . . . .	3.115.371 kg.
Anchovas . . . . .	457.807 kg.
1940	
Total geral . . . . .	6.269.627 kg.
Sardinhas . . . . .	4.695.672 kg.
Anchovas . . . . .	1.272.136 kg.

Verificamos que há em 1940, em relação a 1939 e 1938, um aumento que para o total geral das exportações é, respectivamente, de 50 e 200 %; para as sardinhas, de 51 e 168 %, e para as anchovas, de 178 e 4.740 %.

A nossa exportação para os Estados Unidos, está, portanto, em manifesto progresso. Salientemos, sobretudo, o grande aumento atingido pelas anchovas, que é susceptível de duplicar se nos esforçarmos ainda mais pelo aperfeiçoamento da sua qualidade, que muitos importadores, habituados ao tipo italiano, consideram insufficiente. O ano de 1941 poderá também trazer-nos um aumento muito superior ao de 1940 na exportação de fabricos com espinha, de que não existe, presentemente, em New York, um stock superior a 10.000 caixas, se tivermos fôlha, peixe de tamanho apropriado e os preços destas conservas não ultrapassarem um limite razoável.

Mas, seria bom não nos iludirmos demasiadamente, quanto ao futuro, confiados nos progressos actuais. Durante muitos anos a exportação para os Estados Unidos emperrara nas cem mil caixas, e ultimamente a tendência era para decrescer.

Hoje as conservas portuguesas vão marchando por si próprias, mercê das excepcionais condições da hora presente. Logo que tudo volte à normalidade, a concorrência estrangeira reaparecerá desenfreada e usando de todos os meios para retomar as posições perdidas e conquistar um mercado que será, entre poucos, o que terá mantido intacta a sua capacidade de compra.

Nesse momento, pelo menos, se não puder ser antes, teremos que pôr em prática os métodos próprios, adequados à mentalidade americana, que, diga-se de passagem, difere muito da europeia, para consolidar e alargar as posições adquiridas.

Teremos, forçosamente, que enveredar pela propaganda, que é a chave milagrosa com que se abre as portas deste formidável mas complexo mercado à introdução, em larga escala, de todos os produtos. Não é certamente, para ser agradável às empresas da especialidade que se gastam em propaganda na América, anualmente, cerca de dois biliões de dólares.

Mas propaganda, sem o saneamento comercial do mercado, é dinheiro lançado ao mar. Por isso, será indispensável que além da propaganda outros dois elementos se lhe juntem e se conjuguem para se alcançar plenamente o objectivo desejado, e que são: disciplina de preços e expansão da distribuição.

A desorganização dos preços das conservas portuguesas no mercado americano, como, aliás, em tantos outros, vem de há anos, mas parece que esse flagelo, devido, talvez, ao seu sistema de compra, é ali mais pernicioso do que em qualquer outra parte.

Queixam-se os de cá, e queixam-se os de lá, e, no final, parecem que todos têm razão, porque se há exportadores que perdem, há, por outro lado, importadores que sofrem prejuizos e põem de parte o negócio. As conservas portuguesas são um artigo de preço instável e de lucro contingente, e, por isso, não interessam ao capitalista.

Emquanto não é possível aplicar processos mais radicais para que haja um certo equilíbrio de preços no mercado de forma a garantir um lucro razoável aos produtores, compradores e distribuidores, haverá que dar aos contratos a garantia da sua validade, como instrumentos sérios e respeitados de comércio que devem ser.

Porque, tal qual hoje em muitos casos se entende e se pratica, um contrato de mercadoria a fabricar nada vale. Cumpre-se, ou não se cumpre, conforme as conveniências de momento. Não interessa agora averiguar quem teria dado comêço a esta prática censurável, se o exportador, se o importador, porque caíriamos na questão do ovo e da galinha.

O facto sabido é que uma grande parte da indisciplinada de preços no mercado norte-americano e os seus conseqüentes prejuizos para a indústria, provêm da convicção que alguns exportadores e importadores têm de que os contratos não os obriga.

Se um exportador que firma um contrato a preço baixo, para não deixar fugir a encomenda, e que por esse facto estabelece, automaticamente, o nível geral dos preços para as vendas para os Estados Unidos, em virtude dos entendimentos que regulam as transacções das nossas conservas na Hudson Street, soubesse que o contrato teria que ser cumprido rigorosamente, a não ser em casos de força maior, devidamente justificados, é fora de dúvida que só aceitaria preços que fôsem razoáveis.

Por outro lado, e pela mesma razão, o importador em vez de passar encomendas em quantidades que ultrapassam as suas possibilidades financeiras, criando embaraços e prejuizos aos exportadores que as executam e aguardam indefinidamente a sua liquidação, limitar-se-ia às quantidades que tinha a certeza de poder levantar e pagar.

O alargamento da distribuição aos principais centros populacionais dos Estados Unidos é indispensável para descongestionar o mercado de New York da afluência excessiva das ofertas, concorrendo, indirectamente, para um melhor equilíbrio dos preços, e serve também como base para a futura propaganda, que só pode ser eficaz desde que haja, previamente, uma certa distribuição de mercadorias através do país.

Todos estes vários aspectos do problema da expansão das conservas portuguesas nos Estados Unidos da América do Norte, estão já devidamente ponderados e estudados pela Direcção e Conselho Geral do I. P. C. P., que só aguardam um momento mais oportuno para lhes dar as soluções adequadas.

Todos os esforços e sacrificios que se façam hoje para obter a conquista integral do mercado americano, são justificados e necessários, com vistas ao futuro da nossa Indústria. É um perigo grave abandonarmos neste momento os mercados neutros que continuam abertos, seduzidos pelos preços mais elevados que se obtêm nos países em guerra, e que se traduzem, feitas bem as contas, num aumento do custo do peixe na loja, e não num lucro efectivo para o fabricante. Lembremo-nos que no após-guerra, os países que se mantiverem fora do conflito, não-de continuar a manter intacta a sua potencialidade de compras, enquanto que os outros, economicamente arrasados, não-de reduzir ao mínimo as suas importações. Se pusermos os primeiros de parte, habituar-se-ão a substituir as conservas portuguesas por outros artigos de alimentação, e quando terminada a guerra precisarmos deles para o escoamento da nossa produção, terão desaparecido.

Estão neste caso os Estados Unidos, país de 150 milhões de habitantes, que podem facilmente dispensar o consumo das sardinhas portuguesas porque encontram no seu solo e nas suas águas, com uma abundância maravilhosa, tudo o que necessitam para se alimentar, inclusive as suas «sardinhas», cuja fabricação em conservas atinge, anualmente, cerca de seis milhões de caixas.

LÊM-SE, com frequência, na imprensa, biografias de políticos, de militares, de artistas, raro se lêem biografias de comerciantes e de industriais. E' preciso que parem muito e muito alto, como Ford e outros para que uma vez por outra venham a público algumas notas sobre as suas personalidades.

Estão, também, agora, muito em moda, os livros com carácter biográfico mas, as vidas dos grandes industriais ou dos grandes comerciantes não têm sido o motivo a que os autores dão preferência. Falta de interesse? De maneira nenhuma. A história da vida de Alfredo da Silva, que é a história da União Fabril não dava um livro? Não importaria um livro? Citamos só este; poderíamos citar mais. Borges do Rêgo é outro dos homens que no meio industrial português já tem biografia. Sua vida é tam intensa, sua actividade é tam vasta, que se projecta em diversos ramos da economia.



Joaquim Borges do Rêgo

Levou-o, seu espírito de iniciativa, até ao Algarve, onde a sua larga visão fundou, audaciosamente, a União Industrial, L.<sup>da</sup>

Lê-se este título na frontaria de uma grande fábrica de conservas existente em Portimão. Escrevemos «Lê-se»;

melhor seria que houvessemos escrito «Lia-se», porque, de verdade, durante dois anos, esse título ennegrecido pelas chamas de um grande incêndio que devorou a fábrica, deixou de ser lido, pelas centenas de operários que nela tinham o pão certo de todos os dias. Mas as chamas que abateram o edifício e torceram, com fúria louca, toda a sua maquinaria, não abateram o ânimo de Borges do Rêgo. Suportou a adversidade. Agüentou essa brutalidade do destino e, quando, se quisesse, poderia liquidar tudo e evitar mais trabalhos, Borges do Rêgo mandou reerguer a fábrica. Para ganhar mais dinheiro? Borges do Rêgo podia dispensá-lo. Se a esse homem como a muitos outros

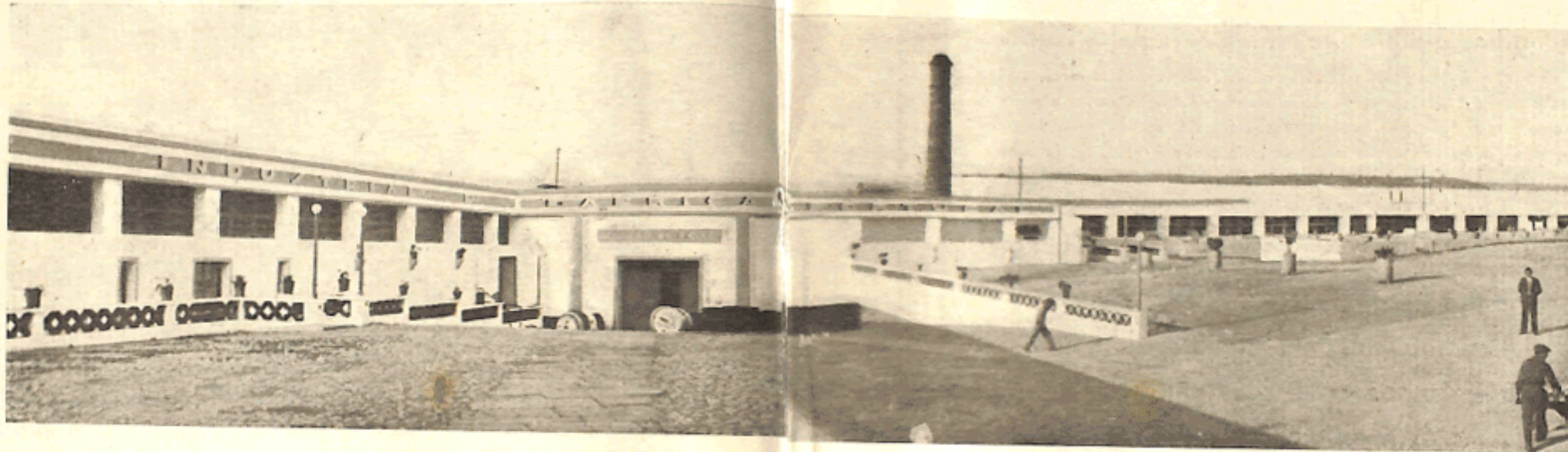


Secção de Peixe

# UNIÃO INDUSTRIAL, L.<sup>DA</sup>

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## Uma iniciativa



Vista geral da Fábrica Portugal em Portimão  
Vue partielle

## que merece destaque

que estão à cabeça de grandes firmas, oferecessem o mesmo rendimento que auferem da sua actividade economica com a condição de se aquietarem, de levarem a vida plácida do bom burguês que nada faz, estamos certos que não aceitariam. Deixar de agir, de viver a vida intensa a que as suas responsabilidades os obrigam era o mesmo que dizer ao cérebro que deixasse de pensar e ao coração que parasse de bater.

O nome e o passado de actividade do industrial Borges do Rêgo já não lhe permitem, por amor próprio, por necessidade psíquica, que deixe de ser quem é, que abandone o caminho que trilhou.

A sua vitalidade física e mental, a sua visão e subtileza, os seus hábitos de trabalho têm de ter um escape, uma aplicação diária e intensa.

E é por essas, e outras razões de ordem sentimental que, Borges do Rêgo reergueu a fábrica.

Não é assim que, geralmente, se vêem os homens de negócios. De uma maneira geral, esses homens são vistos apenas sob o aspecto

Não é um grande barracão, o que Borges do Rêgo edificou. E' uma Catedral do Trabalho, com um lindo jardim, à frente, toda de linhas modernas, inundada de luz, ampla, limpa e apetrechada com maquinaria da mais moderna.

Nela pontificam o escrúpulo de fabrico, a higiene e a disciplina.

Borges do Rêgo voltou a ter a sua fábrica, os seus duzentos operários voltaram a tê-lo por patrão.

O seu crédito de industrial conserveiro voltou a irradiar pelo país, a galgar fronteiras e sulcando pelo oceano conquistou a América que absorve quasi toda a sua produção. Por isso orgulhosamente lhe chamam Fábrica Portugal.

Mas, não há astro sem satélites; não há maestro sem executantes; não há chefe sem ajudantes. Borges do Rêgo, o homem incansável não o esconde. Seu filho Flávio Borges do Rêgo, o gerente da fábrica Evaristo Vasconcelos e o seu pessoal fabril, são os seus colaboradores, os colaboradores de que se orgulha e a cuja dedicação corresponde.



Escritórios e armazéns



Evaristo Vasconcelos

A creche que fundou para os filhos dos seus operários é a prova provada da sua bondade e interesse pelos humildes. Ao Sr. Borges do Rêgo, a seu filho Flávio Borges do Rêgo e ao seu gerente Evaristo de Vasconcelos, *Revista Internacional* aponta-os como exemplo ao país... e apresenta-lhes as melhores homenagens.

xx xx xx xx

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All communications to

**A. B. Vasconcelos, L.<sup>da</sup>**

### Hotel Bela Vista

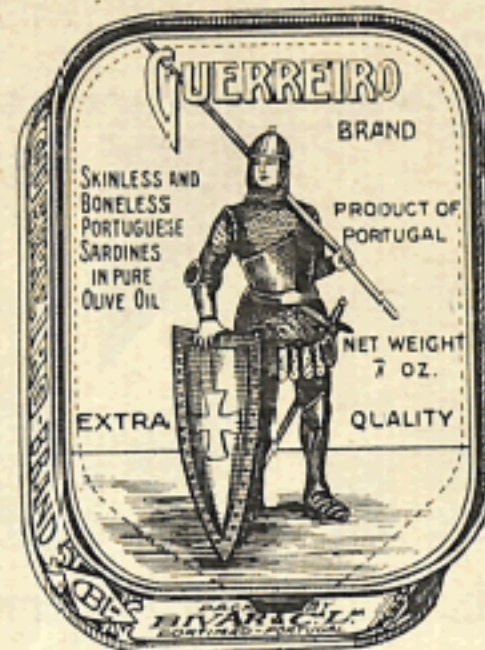
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