



**TOGETHER**  
*for a sustainable future*

## OCCASION

This publication has been made available to the public on the occasion of the 50<sup>th</sup> anniversary of the United Nations Industrial Development Organisation.



**TOGETHER**  
*for a sustainable future*

## DISCLAIMER

This document has been produced without formal United Nations editing. The designations employed and the presentation of the material in this document do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations Industrial Development Organization (UNIDO) concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries, or its economic system or degree of development. Designations such as “developed”, “industrialized” and “developing” are intended for statistical convenience and do not necessarily express a judgment about the stage reached by a particular country or area in the development process. Mention of firm names or commercial products does not constitute an endorsement by UNIDO.

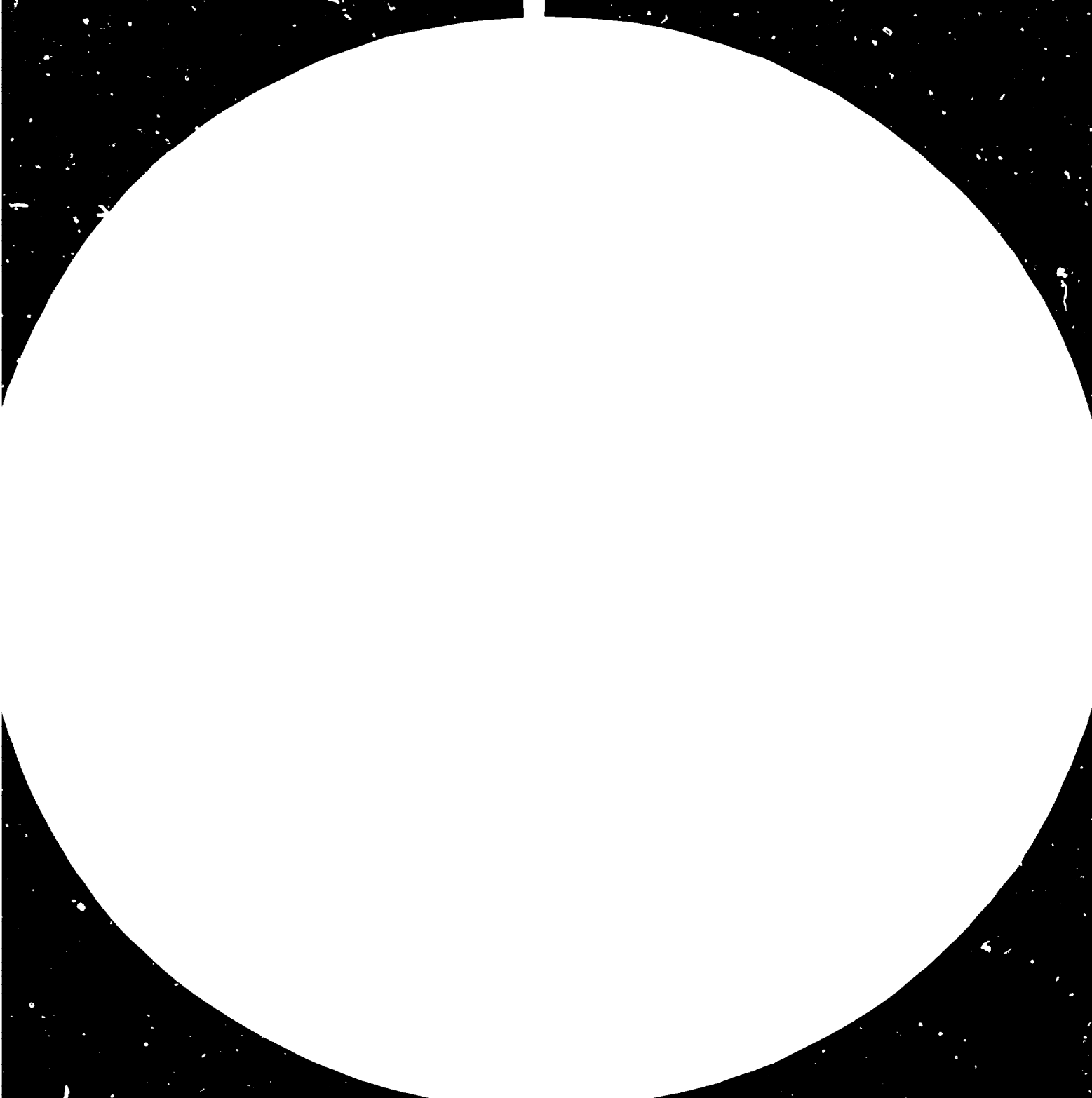
## FAIR USE POLICY

Any part of this publication may be quoted and referenced for educational and research purposes without additional permission from UNIDO. However, those who make use of quoting and referencing this publication are requested to follow the Fair Use Policy of giving due credit to UNIDO.

## CONTACT

Please contact [publications@unido.org](mailto:publications@unido.org) for further information concerning UNIDO publications.

For more information about UNIDO, please visit us at [www.unido.org](http://www.unido.org)







10231



Distr.  
LIMITED

ID/WG.328/6  
21 November 1980

United Nations Industrial Development Organization

ORIGINAL: ENGLISH

---

Round-Table Ministerial Meeting on  
Agro-Industry Development  
Baghdad, Iraq, 19 - 24 January 1981

THE DEVELOPMENT OF SOFT AND ALCOHOLIC  
DRINKS PRODUCTION IN IRAQ

presented by the

Government of Iraq

A. Sabah

000000

## PREFACE

This document, the Development of Soft and Alcoholic Drinks Production in Iraq is one of 18 studies presented as supporting material to the Iraq country paper about the development of agro-industries and state of agricultural production and supplementary industries. We thought of presenting them to assist the reader in getting acquainted with the pioneering experiment in Iraq in the development of this field of our economic activities. This documentation reflects the great development achieved within the years that have already elapsed since the uprising of 17th July Revolution under the leadership of Arab Baath Socialist Party that aimed at achieving economic and social welfare for the people by rational use of the natural resources and elevating our country to the rank of advanced countries within a considerable period.

From the point of view of the Revolution leadership in Iraq, what has been achieved so far in the field of irrigation development, drainage, mechanization of agriculture, animal production, other agro-industries, and other infra-structural development in this field, are deliberate and effective steps towards reaching our aspiration.

In those studies we have tried to highlight the main development features, the negative sides as well as the positive results achieved so far with the objective of presenting our experience to brotherly and friendly countries in particular to those whose conditions and potentialities are similar to our country. This exchange of experience is not only a necessity but a duty imposed on us by our principles and the current international circumstance in which food weapon becomes one of the important weapons raised by imperialism in the face of developing countries. If those countries do not support each other and exchange national experience their task in achieving their food security will be, if not impossible, difficult to achieve.

We hope that our contribution together with that of other participating states and organizations will contribute to the success of this ministerial meeting on development of food industries in developing countries.

Preparatory Committee  
for the Round-Table Ministerial Meeting  
on Agro-Industry Development

THE DEVELOPMENT OF SOFT AND ALCOHOLIC DRINKS  
PRODUCTION IN IRAQ

---

Introduction:

Soft drinks industry is considered one of the important industries in Iraq for many reasons:

- The hot climate especially during summer which is more than five months a year.
- Other refreshment substitutes like yoghurt, fruit juice ... etc. are very expensive.
- Most people prefer soft drinks because they believe in the safety of the production methods. This industry in Iraq has devised special measures to insure hygienic quality.

There are four main categories of soft drinks in the market:

- Cola (four kinds): this is the most widely consumed, i.e., about 60-70 % of the total consumption of soft drinks.
  - Orange (four kinds): consumed at the rate of 15-20 % of the total consumption.
  - Lime (two kinds): quantity consumed is about 5-10 % of the total consumption.
  - Grape juice (two kinds): consumption volume is 5-10 %.
- There are also other soft drinks produced in small quantities not exceeding 2 % such as tonic and cocktail.

All these refreshments are bottled locally, and produced by 13 factories spread over the entire country. Seven of these factories are part of the socialist sector.

There are four types of alcoholic drinks in Iraq, namely:

Beer: There are three beer factories in Iraq with the production capacity of 43 million liters annually. The two new factories are under construction or at experimental phases with annual capacity

of 20 million litre each. Expansions are carried on in the three existing factories.

Wine: These drinks which contain about 7-20 % alcohol are produced by small factories owned by the private sector, mainly from grapes. Their production is very small compared to the beer and arak markets.

Arak: This drink is produced from pure and highly concentrated alcohol after adding distilled water, some flavours and other materials. Arak contains high percentage of alcohol (45 %). Two factories for making arak exists in Iraq. Their actual production is 5.7 million litres of pure alcohol (100 %). About 28 % of this quantity is used to produce methylated spirit for industrial purposes, 7 % is used for producing pure alcohol used for special purposes including medical uses and the rest is used in Arak production.

Mineral Water: The first project in the country is under construction with a capacity of producing 21 million litres/annum.

#### The Development of Soft Drinks Industry

This industry was first introduced in the country at the end of 1949 by bottling of a famous drink under the royalty of the company which produced the concentrate of that beverage. After that, other companies entered this sector and the number of factories reached 12. By 1960, the total annual production was 10 million cases which is about 58 million litres of all kinds of soft drinks. The production increased to 26.7 million cases in 1966. After the establishment of the State Company for Soft Drinks in 1970 by the socialist sector, the capacity of this industry increased further. Expansions of the existing factories and establishment of new ones took place. The increase in production capacity was 30.3 million cases per year in 1972 and reached 41.5 million cases per year in 1977.

The production of the State Company for soft drinks was 36.2 million cases per year in 1978 which means a production increase of about 5.5 million cases per year compared to 1977, as shown in Table (1):

Table (1)  
Annual Production of Soft Drinks

Year	Production		Percentage of Socialist Sector Share
	Socialist Sector	Private Sector	
1970	16869000	9531000	% 63,9
1971	16300000	98000000	% 62,5
1972	20155000	10145000	% 66,5
1973	17111000	10089000	% 62,9
1974	19145000	9755000	% 66,3
1975	18384000	9816000	% 65,2
1976	23476000	9824000	% 70,5
1977	30684000	10816000	% 73,9
1978	36162000	No information	
1979	35415000	available.	

Plans have been made by the State Company and other Organizations concerned for the development of this industry in many aspects. These are:

- 1 - Increasing the actual production.
- 2 - Finding substitute raw materials.
- 3 - Manufacturing of packaging and canning materials.
- 4 - Introducing new products to the local market.
- 5 - Development of quality control mechanism.



### Production Increase

The State Company for soft and alcoholic drinks has planned to expand the existing factories and establish new ones within a five-year program as follows:

A - 1979 Projects:

Three production lines have been established with the production capacity of 1100 cases per year each. The first in Mosoul factory, the second in Missan, the third in Basrah. The average annual production for each line is 4 million cases approximately.

B - 1980 Projects:

The construction of the new factory for soft drinks and mineral water started in Sulaimanyah governate in the north region. The production capacity will be 4 million cases annually of soft drinks and 21 million litres of mineral water.

C - 1981 Projects:

It is planned to establish a new factory in Baghdad which contains two production lines with a capacity of 1100 cases per hour each at the first stage. This factory is designed to include 12 production lines with higher capacities and all the production requirements such as water treatment plants, boilers, production halls, stores, electrical and mechanic workshops.

The plans for improving the soft drink industry will also include:

- The expansion of Mosoul factory by adding a new production line with a capacity of 1100 cases per hour.
- Establishing a new factory in Hilla instead of the existing one which will include three production lines each with the capacity of 4 million cases per year.
- Expanding Altamim factory by adding a new line with the capacity of 1100 cases per hour.
- Establishing a new line in the new Basrah factory with the capacity of 1100 cases per hour.

The schedule for implementing these projects and expansions will continue until 1985, taking into account the following considerations:

- The implementation capacity of the State Company for soft and alcoholic drinks
- Priority in implementing the projects in the regions suffering from shortage
- Geographical locations and the distance from the supplying centers.

The above-mentioned expansions will lead to a total increase in production of about 20 million boxes in 1985. This increase plus the increase of production in the private sector factories will increase the possibility of covering local demand for these drinks.

#### Finding Substitutes for Raw Materials

This subject has been given considerable attention by the State Organizations and State Companies concerned because it is a main issue for developing this industry as a whole and specifically, it helps the creation of an integrated national industry. In this connection, the State Company closely cooperated with other states in:

#### A - Producing grape concentrates.

Within the canned fruit project in Arbil - in the north region of the country - a productive line was established to produce natural grape concentrate 100 % for producing soft drinks, the capacity of this project is (1500) tons per year. The volume of grape concentrate imported is (370) tons per annum.

It is estimated that consumption will increase after the establishment of this project which will substitute other soft drinks which are using imported raw material concentrates.

B - Liquid sugar.

In Babil governate, a factory has been established to produce liquid sugar from dates with the capacity of (30000) tons per annum, with suitable specifications to be used in the production of soft drinks instead of imported crystalline sugar. This project is the first in the world in producing liquid sugar from dates.

Using these substitutes will be one of the ways for manufacturing agricultural products to participate indirectly in substituting imported materials such as concentrated grapes or to substitute partially materials like raw sugar for refining in the existing factories.

Manufacturing Containers and Packaging Materials

Several factories are producing plastic crates used to pack soft drink bottles, bottle crowns, and different sorts of bottles, including soft drinks and beer bottles.

A - Plastic Crates.

There are two big factories annexed to the State Company for soft and alcoholic drinks, one in Missan, and the other in Baghdad. Both produce different sorts of plastic crates suitable for containing soft drinks, milk and beer. They also produce other sorts of boxes for preserving and transporting agricultural products. Total production of all sorts of boxes was about (3.783.400) boxes in 1979.

These factories also produce plastic barrels of (40) litre capacity to preserve and transport different products such as liquid sugar and alcohol. Plastic containers of (5) litres capacity are also produced for different purposes.

The total production of these factories are as follows:

- 3950 000 different sorts of boxes
- 480 000 barrels of (40) litres
- 1680 000 containers of (5) litres

A private sector factory also exists with the capacity of (540 000) boxes per annum.

B - Bottle Corks.

The existing factory of the state company for soft and alcoholic drinks produces corks to cover the need of all the state company factories; its production capacity is (1000) million corks per annum. There is another factory in the private sector with a capacity of about (300) million corks per annum, and covers partially the demand for other soft drink factories.

According to the plans for expanding production, the existing capacity of the cork factory will be increased to (2000) million corks per annum. This factory after its expansion, is expected to cover the demand of the state company for dairy products as well.

C - Glass Bottles.

Part of the demand for glass bottles is covered by the production of the glass factory in Ramadi, the other part is met by imported bottles, especially green bottles used to preserve lemon drinks.

## ALCOHOLIC DRINKS

Alcoholic drinks in Iraq are produced by the private sector, except beer, which is also produced by the factories of the socialist and mixed sectors as well.

### 1 - Beer

The first company that produced beer was established in 1942, under the name of "Iraqi Beer Company". It produced 1 million litres per annum. Increasing demand and the limited capacity of the company resulted in the establishment of the Eastern Beer Company in 1956 with a capacity to produce 3 million litres per annum. Total sales was about 1.5 million litres per annum which was about half the capacity of this company.

Consumption increased gradually with similar production increase until it reached 7.5 million litres in 1970. After that date, the demand on beer increased at higher percentage rates compared to previous years. The production in 1974 reached 14.3 million litres. A new company was established under the name of National Beer Company and started production in 1975. Its capacity was 8 million litres per annum.

Expansions continued until the total capacity of the three factories reached about 43.792.000 litres in 1979. If we add to this the volume imported which was 14 million litres, the consumption volume in 1979 was 58 million litres. In spite of this, the market is still in shortage of supplies.

Production increase was accompanied by diversification in bottling systems. Added to the traditional half litre glass bottles were tin cans of 330 ml. draft beer barrels, for which

a new complementary factory was constructed to produce beer aluminum cans. Units were established to wash and sterilize and fill beer barrels of 30 litres in the Baghdad factory of the State Company for soft and alcoholic drinks.

Development Perspectives

According to the information given in Table (2), it is clear that consumption has increased since 1975 at higher rates. The increase noted for this year reaches 40 % compared to 1974. Beer producing companies started to plan and implement expansions in their existing factories. Socialist sector has actually established two big factories - one in Missan governate, the other in Mosoul, which started production in 1980. Production capacity for each is 20 million litres per annum. The Baghdad factory was expanded to increase its production about 4.5 million litres per annum.

Table (2)  
Beer Production Volume in Iraq

Year	Unit	Eastern Beer Company Private Sector	State Company for Drinks Socialist Sector	National Beer Co. Mixed Sector	Total
1970	Thousand Litre	5720			
1971		6382			
1972		7490	2772		10262
1973		9068	2770		11838
1974		9636	4752		14388
1975*		10285	7149	2664	20098

.../

\* Production started in July/1975.

.../ Table (2) Beer Production Volume in Iraq

Year	Unit	Eastern Beer Company Private Sector	State Company for Drinks Socialist Sector	National Beer Co. Mixed Sector	Total
1976		11093	6597	8366	26248
1977		11090	8600	11201	30891
1978		11090	9133	15829	36052
1979		14658	9550	19584	43792

National Beer Company (mixed sector) has planned to add a new production line with a capacity equal to the actual capacity which will be 20 million litres during the period 1980-1985.

As for the Eastern Beer Company, it has planned to add new filling machines to increase production capacity to about 6 million litres annually. This expansion work will be carried out during 1981.

According to the above information, it is expected that during the next two years the production will be about 90 million litres per annum. At the end of 1985, it will be 114 million litres.

#### Raw Material for Beer Industry

Malt is the main material in beer industry. Total demand for malt for the existing factories is about 8500 tons per annum. This quantity needs more than 12000 tons of raw barley. After completion of the planned expansions during the period 1981-1985 the demand for malt will increase to 21700 tons with corresponding increase of 30000 tons of raw barley.

For this reason, the first malt factory was established in 1950, within the Iraqi Beer Company, with the capacity not exceeding 850 tons per annum. This factory was the only one until 1977, when a new factory was established with nominal capacity of 10000 tons per year. Import will continue to cover the demand until the local capacities are expanded to reach the equilibrium point between malt and beer production.

## 2 - Wine

Wine industry is considered among the oldest industries in the north region of Iraq, where vineyards exist in large quantities. Production process was originally done by primitive methods at houses. In mid-fourties, few small private factories were established to produce wine using more developed methods. In the subsequent years, consumption of wine increased considerably. Unfortunately, adequate information is not available about this period.

Within the socialist sector, it was decided to start producing and filling wine in the Arbil factory for canned fruits with a capacity of 850 000 litres per annum. The factory is equipped with modern machines and stores. This capacity is still less than expected but it must be remembered that the experience of the socialist sector in wine production is still new.

## 3 - Alcohol and Arak

It is difficult to define the exact period for starting arak industry in the north region. Arak was produced directly by fermenting and distilling grapes by primitive ways. The first company specialized in alcohol and arak



production was established in 1945, with one production line according to the right industrial bases. Dates were used as raw material to produce pure alcohol (95 %) which is the base for medical alcohol and arak production as well as industrial alcohol concentration of 87-88 %.

Production Volume

Annual arak production during the period 1960-1968 was constant, at the level of about 2.5 million litres. After 1960, alcohol and arak production increased considerably, especially during the last three years as shown in Table (3) and (4).

Pure alcohol (100 %) production for the last three years has been about 5.6 million litres. Similar increase is reached for alcohol derivatives.

Table (3)

Volume of Dates Consumed and Alcohol Production

Year	Dates Consumed (Ton)	Alcohol Produces (Thousand Litres)
1971	10899	2635
1972	11378	2671
1973	13776	3052
1974	15379	3608
1975	18315	4067
1976	26545	5267
1977	27455	5591
1978	31205	5697
1979	28213	5571

Table (4)  
Pure Alcohol Production and Derivatives Volume

Year	Unit	Pure Alcohol	Derivatives		
			Arak	Methylated Spirit	Pure Alcohol
1971	Thousand Litre	2635	3436	879	111
1972		2571	3992	856	124
1973		3052	4221	985	163
1974		3608	5669	1039	187
1975		4067	6221	1366	217
1976		5267	7888	1455	346
1977		5591	8817	1623	271
1978		5697	8508	1500	356
1979		5571	7919	1718	423

About 65% of pure alcohol is transformed to arak at the concentration of 45 %.

Due to the large utilizations of alcohol, especially the industrial alcohol, a factory of the socialists sector was established to produce alcohol with concentration 95 % purity and its volume is equal to 2 million litres per annum. This is to cover the needs for industrial, medical and high concentrate alcohol allowing the private sector factories to specialize in alcohol drink (arak) production.

2

