



INSTANT COFFEE GUIDE FOR BARISTAS

PROCESS
TECHNIQUES

EXPLORE
& ENJOY INSTANT
COFFEE
BRAZIL



INSTANT COFFEE GUIDE FOR BARISTAS

PROCESS TECHNIQUES

History of instant coffee in Brazil	.7
Elaboration of Instant Coffee	.8
Basic Process Flowchart.	.8
Raw Material	.9
Blend	.9
Roasting of Beans	.9
Coffee Oil	.9
Granulation	.9
Extraction	11
Extract Treatment	11
Aroma Recovery	11
Concentration	11
Concentration by evaporation	12
Cold concentration	12
Coffee extract.	12
Drying	12
Spray Dried	13
Freeze Dried	13
Drying – Agglomeration	14
Instant Coffee: Process in Summary	15
Certifications of the Instant Coffee Industries	16
Product Analysis	16
End of the Process	17
Why one should not compare instant with roast and ground coffee	18
Nutritional Differences between R&G and Instant Coffee	18
Differences in Preparation of instant and R&G Coffee	19
Organic and Decaffeinated Coffees	20
Sensory Evaluation	21
Sample Preparation	26
Application and Uses of Instant Coffees for the Final Consumer	28
Preparation Tips.	28
Applicability	29
Recipes	30
Epilogue.	32
Institutional Video.	32
Bibliographical References	33



THE HISTORY OF INSTANT SOLUBLE COFFEE IN BRAZIL

From 1901 until nowadays, instant coffee has gone through a series of transformations to become the product we know today.

The origin of instant coffee dates back to 1901, when Mr. Satori Kako, a Japanese chemist living in Chicago, USA, invented an instant coffee powder, sold during the PanAmerican Exposition in New York. Years later, this product was adapted by an American chemist that created the refined instant coffee, which would be commercialized in larger scale.

Decades went by until a big opportunity arose from the surplus of coffee stored in Brazilian warehouses during the 1930s world crisis. Swiss companies were asked to study ways of transforming the stored coffee into "ice cubes" that could preserve the coffee attributes for longer periods and that could be sold to consumers.

It was Nestlé's chemist, Mr. Max Morgenthaler, that developed a solution and in 1937, he presented a coffee powder that was easy to be dissolved in water for consumption,

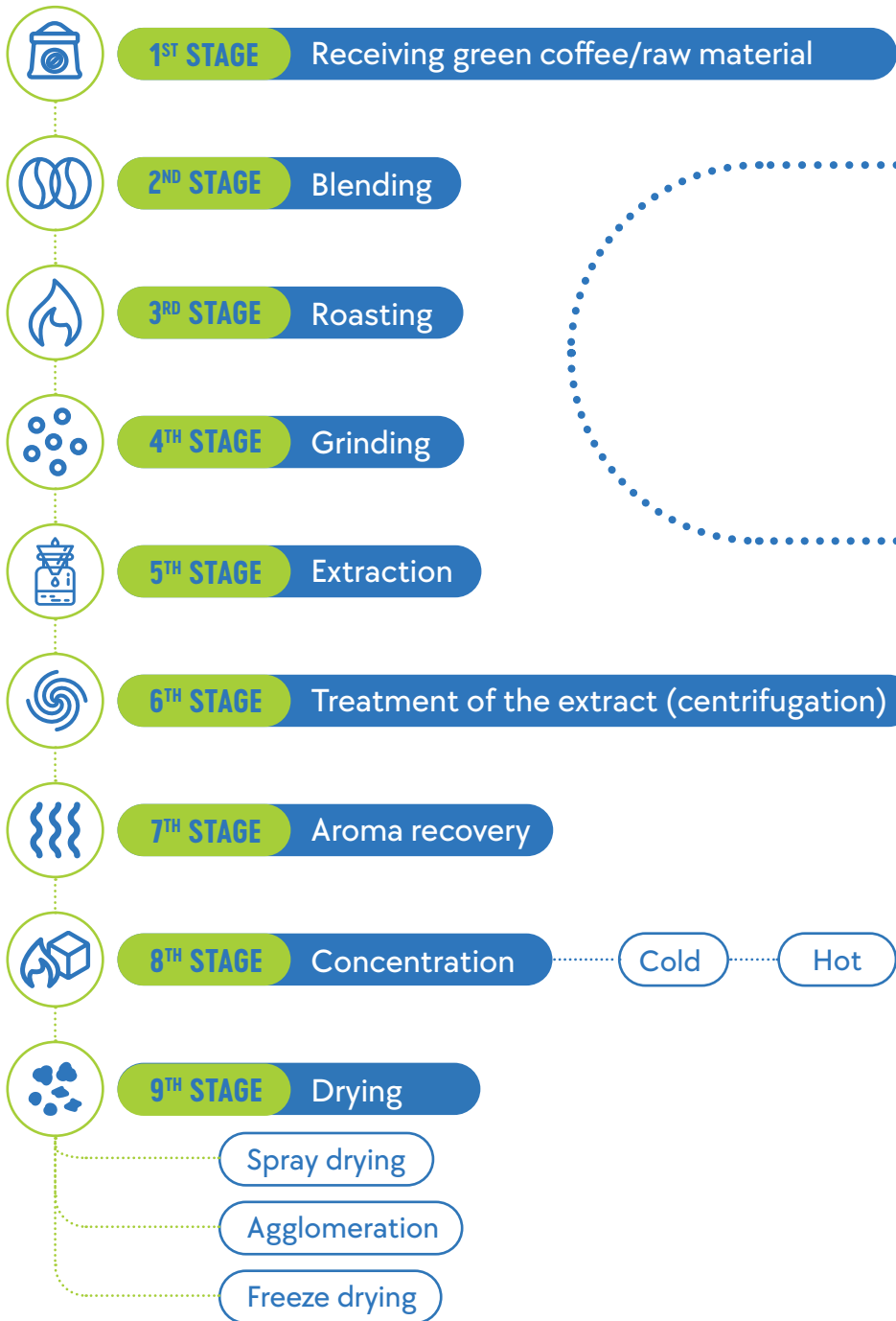
and which also presented features that resembled those of fresh coffee. Nestlé then financed the manufacturing of this innovative product, launching Nescafé in 1938, an immediate success in Europe and the United States. It was also used by American soldiers during the Second World War due to its practicality and easy preparation.

In Brazil, instant coffee arrived in 1953; efforts to attract and install instant industries were made from the 1960s onwards, when the majority of the companies associated with ABICS were founded and started activities. Brazil has been the world's leading instant coffee producer and exporter since then.



ELABORATION OF INSTANT COFFEE

BASIC FLOWCHART OF THE PRODUCTION PROCESS



1ST STAGE Raw materials

Both coffee species, *Coffea Arabica* and *Coffea Canephora* (Robusta and Conilon) are used in the production of instant coffee. Defining which one will be used depends on the desired sensory profile – aroma and flavor.

2ND STAGE Blend

Green coffees are graded by their physical and cupping (beverage) features. According to the Brazilian coffee Grading system green coffees are graded by their physical and cupping (beverage) features and other analyses are done as well: moisture level, ochratoxin A, foreign bodies, impurities and sensory analysis. Furthermore, the blends are prepared and then roasted.

3RD STAGE Roasting of Beans

The first step in the production process of instant coffee is roasting. During this stage, characteristics such as flavor and aroma are developed. The intensity of roasting is also measured by the color of the coffee beans after they go through this process, which may vary from lighter to darker tones. It is also possible to work with light or dark blends, Arabicas with Conilons.

The roasting degree will define the final beverage's sensory profile. The verification of color is made using specific equipments in order to guarantee a standardized reading of each lot of roasted coffee.

It is important to mention that the roasted color of the raw material is not directly associated with the color of the final product, because the sensory profile is defined during roasting, but in instant coffee the color tone of the powder or granules is also evaluated.

Coffee Oil

Coffee oil is another product obtained after roasting, from the cold pressing of the coffee beans; it is a versatile product, used by the industry for different purposes.

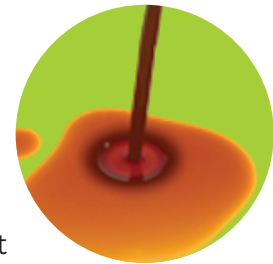


FIGURE 1
Coffee Oil

4TH STAGE Granulation

Roasted coffee is broken into uniformed parts, in order to obtain a larger contact surface between the hot water and the roasted bean, boosting the extraction of the soluble solids. The use of an extremely fine granulometry is not recommended since the small particules could clog the extraction filters at the outlet of the percolator (column). Each broken coffee bean generates 4 to 5 parts.



5TH STAGE Extraction

Right after granulation, comes extraction. The extraction is the percolation of water (under high pressure and temperature) through the coffee to remove the bean's soluble substances by infusion. This is done in stainless steel columns connected by tubes that allow the passing of water from one column to the other successively.

In order to understand this stage, one should picture several coffee filters put one on top of the other; in each filter there is ground coffee. Then hot water is poured in the first filter and this percolates to all the other filters; in the end there is a very dark liquid, called coffee extract.

This extract is composed of water and coffee soluble solids; the liquid still contains a lot of water that will be removed in the following stage (concentration). Whenever needed, the extract can be centrifugated for the removal of insoluble solids.

Extraction is similar to an espresso (with pressure and temperature), with coffee parts that have distinctive flavor and aromas. The first part of extraction has more sugars, and the last one has less flavor and aroma components.

Example of percolation: in this extract, the solid concentration can vary between 6 and 32%, depending on various factors such as blend, roasting, etc.

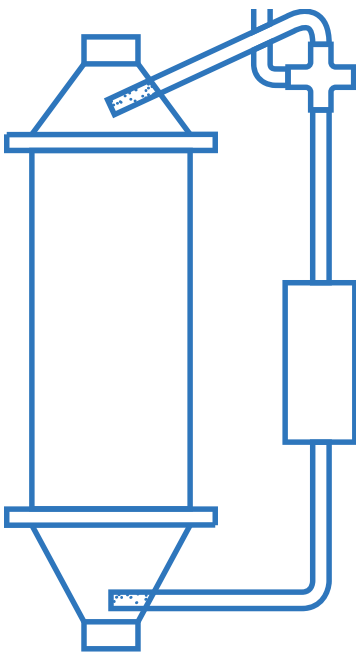


FIGURE 2
Drawing of the per-
colation column



Extraction can be performed using different methods, with the goal of obtaining distinctive flavors from the same raw material: a continuous flow or the separation of extracts in different parts, for instance, similar to a short or long espresso.

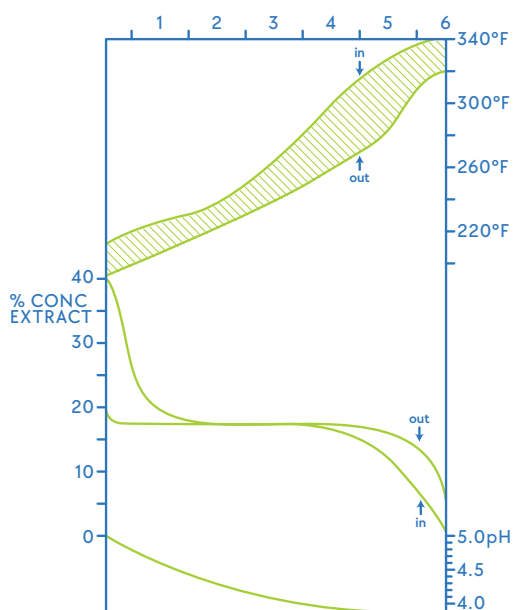


FIGURE 3
Graph of temperature profile in the extraction column

6TH STAGE Treatment of the extract

The extract is treated (centrifugated/filtered) before the concentration stage, preventing insoluble particles from remaining in the process.

7TH STAGE Aroma recovery

Before the extract is sent to concentration, it is processed in the aroma recovery system. In this phase, the aromatic components of the extract are separated by means of steam extraction, condensed and stored in a hermetic tank. The extract is sent to the evaporator to increase the concentration of soluble solids. After the defined concentration is reached, the coffee aromatic fraction is reincorporated to the product that will be sent to the drying stage.

8TH STAGE Concentration

Part of the water contained in the coffee extract is removed during concentration, until reaching concentration of soluble solids that allow the drying to result in soluble powder.

After concentration, the coffee extract is ready to be dried in this stage, or to be packed into drums or jerry cans and frozen, in order to be shipped to countries like Japan, for example.

The extract concentration can be elevated to levels close to 60% of soluble solids to facilitate drying.



This process can be conducted in two ways: using heating or freezing methods.

Concentration by evaporation (heating)

During hot concentration, approximately half of the remaining water is eliminated from the extract, increasing its concentration.

In hot concentrators, the water present in the extract is evaporated using a vacuum system, with temperatures lower than the boiling point of water, avoiding the excessive waste of coffee aromas.

Cold concentration

Cold concentration is based on the crystallization of part of the water present in the extract, with the removal of ice crystals, which eliminates around 40% of the initial water content. With this process, the aromatic components are preserved, enhancing the aromas of the final beverage.

Coffee Extract

After concentration, the extract can be stored in drums that will be exported frozen or sent for the final drying stage.



FIGURE 4
Coffee extract

9TH STAGE Drying

The drying of the coffee extract can be made using two processes: by heating (evaporation) – spray dried, or by freezing (sublimation) – freeze dried.

In order to better understand this stage of the process, check the graph about the triple point of water.

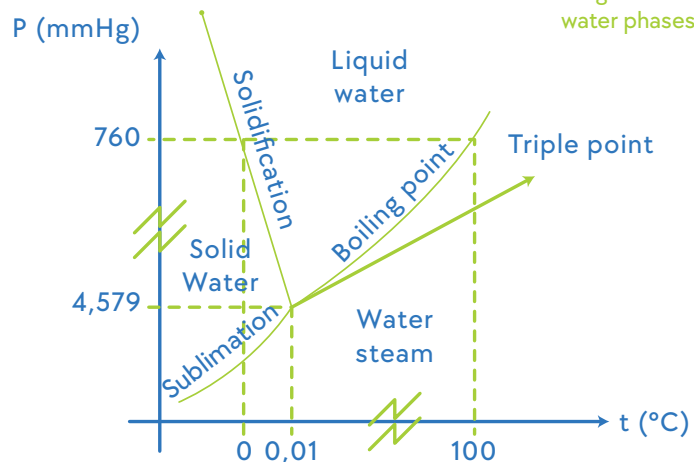


FIGURE 5
Diagram of the water phases

The passing of water from the liquid to the gaseous stage occurs when it reaches temperatures of about 100° C. However for the water to go straight from the solid to the gaseous stage – without passing through the liquid stage – it is necessary to subject it to low pressure processes. Therefore the water sublimation takes place in low temperatures.

Spray Dried - Sprinkling

The extract is sent to the drying tower, where it is pumped to its top. Meanwhile, there is an injection of hot air (around 200° C or more to cause water evaporation to start)

The extract is injected, by means of a spray, in droplets that form small spheres, and the water contained in these extract particules is evaporated during their fall within the tower.

The dry powder is removed from the lower part of the tower; its final temperature is 32° C, on average, with a 3% moisture level¹.

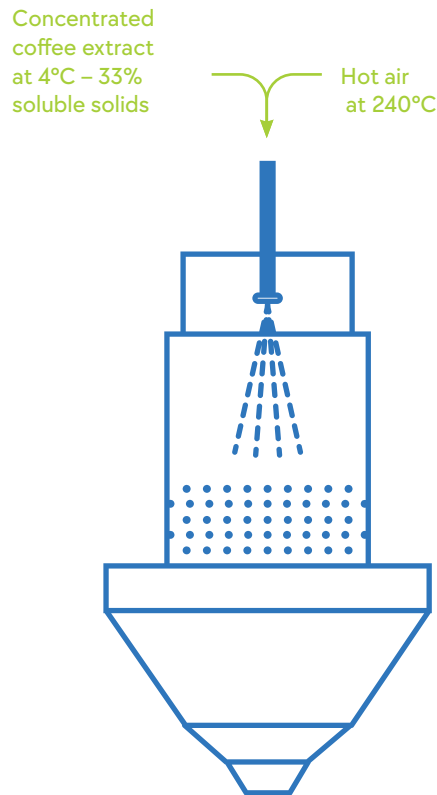


FIGURE 6
Profile of the drying tower

FIGURA 7
Powder aspect – Spray-dried



FIGURE 7



Freeze Dried



This is another method of coffee dehydration. After concentration, the extract is freeze-dried in a cold chamber in 3 stages: -5° C, -20° C and -50° C, enabling it to preserve its attributes.

¹ Source: Coffee Technology Sivetz, page 381.



The frozen extract is ground, granulated and graded in screens (defining the particles' size). Afterwards, it is deposited in a tray. The granulated product is sent to a vacuum chamber, where it is dehydrated at low temperatures, which makes the water go straight from the solid to the gaseous stage (by sublimation).

The tray is unloaded, generating a dried product which will later be sifted, according to the granulometry specifications.



FIGURE 8
Aspect of the crystals and granules of freeze-dried coffee

Agglomeration

It is a process that consists of grinding the spray dried coffee into even finer and smaller particles (similar to a powder), that are then moisturized when in contact with steam, resulting in a granulated product. This will later go through screens to define the size of the particles, in order to specify the granulometry.



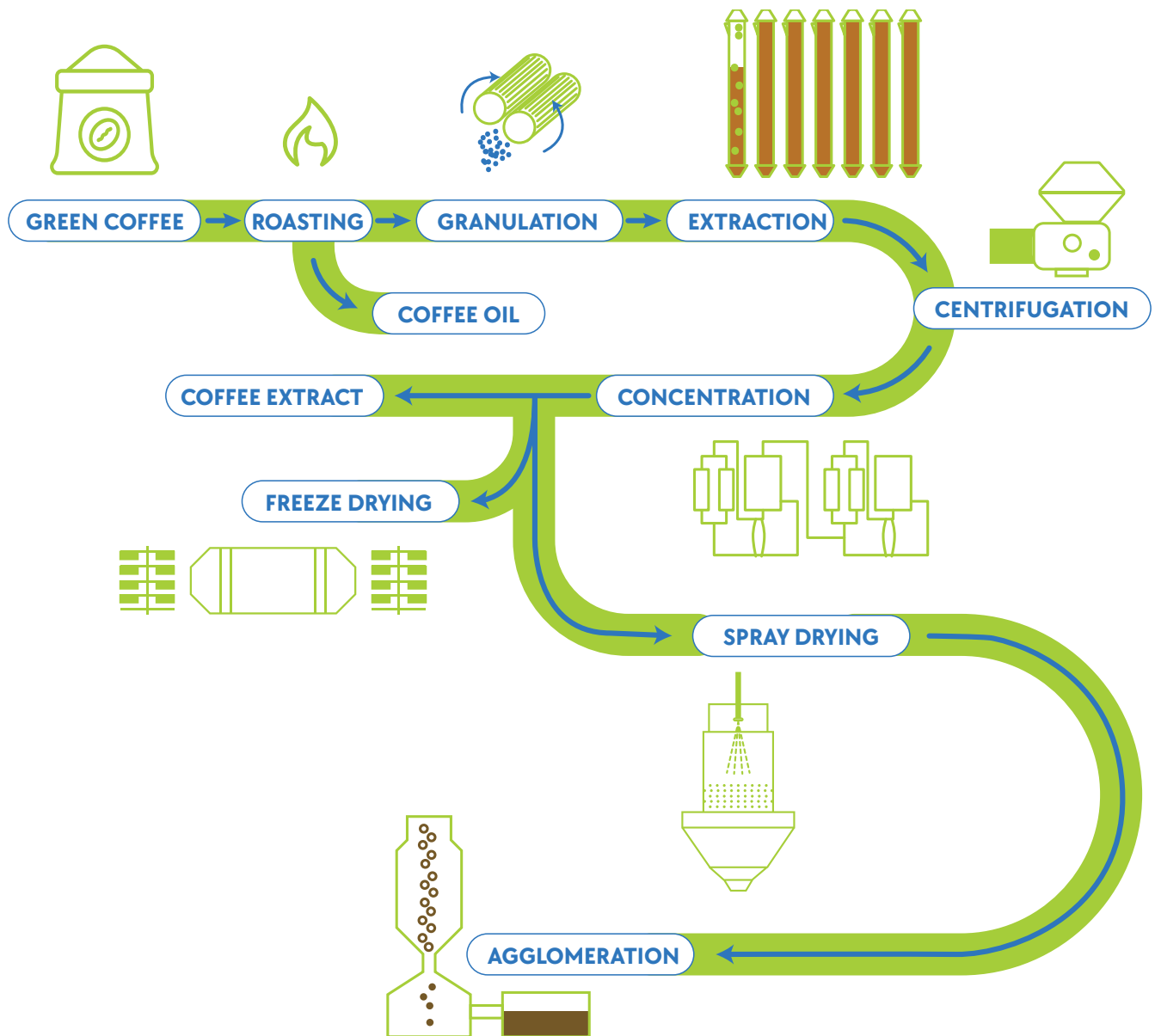
FIGURE 9
Aspect of agglomerated powder

With these QR Codes it is possible to access infographics and animations with details about the process you have just learned about. Access it for further understanding.



SUMMARY OF THE PRODUCTION PROCESS OF INSTANT COFFEE

Coffee and Water



CERTIFICATIONS OF THE INSTANT COFFEE INDUSTRIES

In order to cater to the requirements and specific demands worldwide, instant coffee industries are audited and accredited by international certification standards. Some of these are listed below, in Table 1.

- Kosher

- Halal

- ISO 9001

- FSSC 22000

- IBD Certifications

- HACCP

- Fair Trade

- JAS CERES

- ISO 14001

- ISO 22000

- BRC Food Certified

- Rostest

- USDA Organic

- Demeter

- Rainforest Alliance / UTZ

- ABIC's Seal

- 5S Program

PRODUCT ANALYSIS

In the instant coffee industry, all of the processes are monitored with rigorous care. There are continuous testing and improvements, from sourcing of raw materials to shipment, to guarantee the best quality of the final product. Check below some of these analyses:

Physicochemical analysis during the process

- Moisture level;
- PH;
- Sediment;
- Density;
- Concentration (Brix degree).

Final product analysis

- Ochratoxin A;
- Moisture;
- PH;
- Acrylamide;
- Ashes;
- Carbohydrates;
- Aflatoxin;
- Caffeine.

Microbiology

- Mold and yeast;
- E. Coli (Escherichia Coli);
- Fecal coliforms;
- Salmonella.

TABLE 1
Certifications

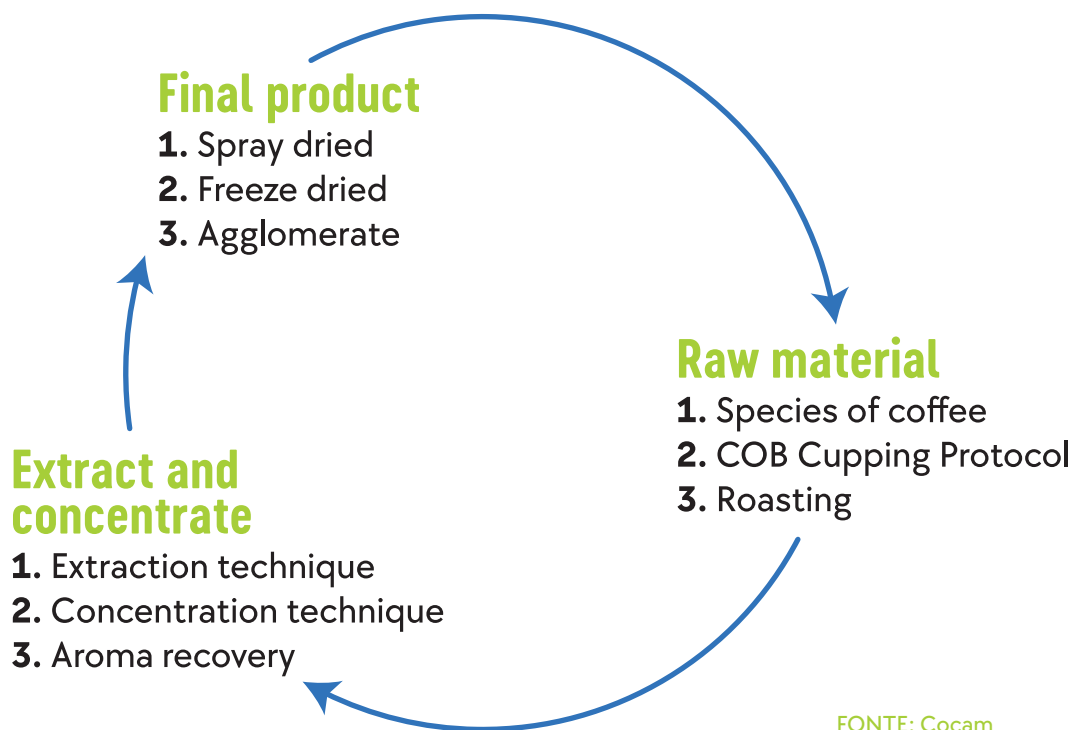
THE END OF THE PROCESS

The production process of instant coffee is conducted with the use of only two ingredients: roasted coffee and water. Using physics (temperature and pressure) and technology it is possible to create completely different recipes and profiles, adapted according to the final use of the product, which ranges from ingredient to the food and beverage industries to instant coffee itself for the final consumer.

The instant coffee industry is deeply committed to sustainability: each residue generated through the production process is transformed in

biomass, later used as fuel for the boilers. All the water used is treated and returned to the environment in even better conditions than they originally were. These procedures are carried out in accordance with norms established by federal and state agencies.

The sensory physicochemical and microbiological analyses are usually conducted in laboratories located within the instant coffee industries, which have state-of-the-art equipment, regularly audited by accredited institutions authorized by state and federal bodies.



WHY ONE SHOULD NOT COMPARE INSTANT AND ROAST AND GROUND COFFEE?

Instant coffee is not similar to R&G in regard to physical and sensorial features. Although we instinctively tend to look for a known flavor, they are technically different.

Instant coffee has a complexity of flavors and aromas due to the conditions of preparation during all of its distinct processes: temperature and pressure to which the beans are submitted to be transformed into powder (spray dried) or granules (freeze dried).

It is important to note that only coffee (beans), water, temperature and pressure are used to conduct all of the processes.

The differences found are related to the uniqueness of the production process that varies according to the desired final result. In the case of roast and ground coffee, the process involves roasting and grinding. In instant coffees there are the same two stages, followed by extraction, concentration and drying.

Nutritional difference between R&G and instant coffees

DETERMINATION	RESULT R&G (Each 100g)	RESULT SOLUBLE (Each 100g)
Energetic value by calculation	227kcal	278kcal
Carbohydrates by difference	14,3g	49,1g
Protein	16,3g	19,7g
Fat	11,6g	0,3g
Saturated Fat	5,0g	Less than 0,2g
Trans Fat	Less than 0,1g	Less than 0,2g
Total Dietary Fiber	49,7g	19,6g

IMPORTANT:

The results shown are valid only for the analyzed samples under specific conditions, and are not extensive to other lots.

TABLE 2

Comparison between roast and ground and instant coffees. Source: Cia Iguaçú

Fat, saturated fat and trans fat:

presented in higher levels in R&G, when extraction alone is not enough to transfer the lipids molecules, which remain in the coffee grounds leftover in the filter.

Total dietary fiber: presented in higher level in R&G for the same reasons. A large part of the total fibers are formed by cellulose and lignin molecules that remain in the coffee grounds, in the filter.

Differences in preparation of Instant and R&G coffees

Among all coffee brewing methods, espresso is the most similar one because both use high pressure.

We can split the process in 3 stages:

1° WETTING: At this stage the coffee particles are prepared for the extraction of soluble solids.

2° EXTRACTION: The extraction of soluble solids occurs rapidly, after water absorption.

3° HYDROLYSIS: It is the breaking of insoluble carbohydrates in water into smaller particles, that become soluble, and because of that end up being a part of the extract.

In roast and ground coffee (R&G) the process ends in the extraction stage, whereas in instant coffee it continues until the hydrolysis phase, whose temperatures reach 160°C to 175° C, under pressure.

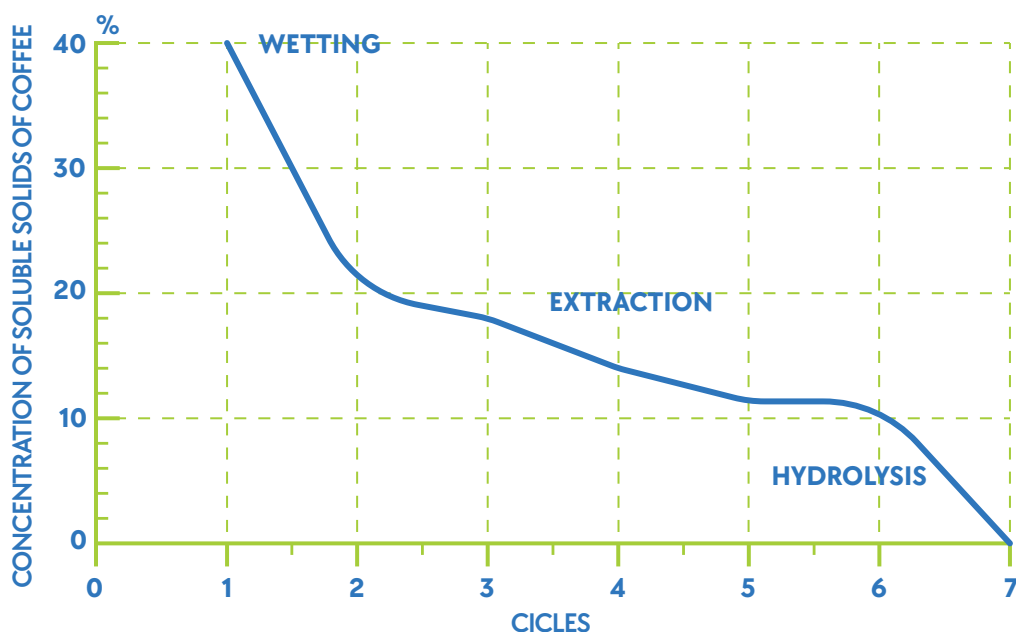


FIGURE 10
Extraction
profile graph



Apart from the 3 stages mentioned, there are other 3 technical factors that differentiate instant coffee from the standard roast and ground:

1. COLLOIDAL MATERIAL: Roast and ground coffee has a larger share of colloidal material/oils extracted during its preparation. Instant coffee has less colloidal matter in the beverage.

2. AROMA: The more aromas reincorporated, the greater the resemblance between instant and R&G coffees. Roasted coffee is

extremely aromatic and when submitted to high temperature and pressure, these aromas are more perceptible. During the extraction process, they are captured by water vapor and later, reincorporated into the process, making the aroma of instant coffee similar to the one of roast and ground coffees.

3. HYDROLYSIS: the more intense, the higher the deviation of coffee flavor.

ORGANIC AND DECAFFEINATED COFFEES

It is important to observe that both instant and roast and ground coffees can be made from decaffeinated or organic beans.

The decaffeination process is conducted with the green bean, before roasting (raw material). Afterwards the solubilization process is similar to regular coffee, going through all of the stages previously mentioned.

The caffeine base present in instant coffee follows the green coffee one, since it is thermostable.

CUP OF 50ML OF WATER TO 1G OF POWDER	CAFFEINE
Arabica	26mg
Canephora	40mg
Decaffeinated	3mg

Sources: Sivetz e RDC 277 of 22 September, 2005

For the industrialization of an organic coffee, the entire process line has to be adapted so that no residue of non-organic coffees is found.

SENSORY EVALUATION

Due to all the processes that soluble coffees go through, a methodology was developed based on these coffees' main sensory attributes. This way, there is better understanding and proper application of soluble coffees, according to their use or consumption.

The 15 attributes to be evaluated are: sweetness, acidity, woody, floral, herbaceous, fruity, spices, nuts, chocolate, honey, potency, astringency, bitterness, intense coffee extraction, body.

After all process stages, coffees present different flavors and aromas, and as mentioned earlier, any coffee can be processed as soluble. This implies that instant coffees will have different qualities, and the range of qualities of instant coffee can be as wide as that of roast & ground coffee.

However, unlike roast & ground coffees, which have widely recognized quality assessment systems such as the SCA Cupping Protocol, soluble coffee products lack a system to assess quality and communicate it well to businesses and consumers.

The quality of soluble coffees can be graded based on the intensity of various attributes, being them desirable or undesirable. This allows cuppers to act as descriptive tasters when assessing the intensity of various flavor attributes, and the coffee's score or quality grade will be the result of the "desirability weights" of those attributes. This brings an additional advantage to consumers: this method directly relates to the flavor of the product, so its quality can be easily communicated in terms of specific flavors.

The application of this "objective" or "descriptive" quality assessment to soluble coffee has several advantages: it demonstrates that there is a consensus within the soluble coffee industry about which attributes are more desirable than others; it demonstrates that modern sensory science tools can be applied in the instant coffee category to encourage transparent product differentiation, and it enables the category to have a comprehensible language about taste and quality for communication with its consumers.



The first step was creating an evaluation system based on the descriptive aspects of soluble coffee and identifying soluble coffee's main flavor attributes. The second step was identifying the interrelationships between main flavor attributes and perceived quality, to obtain the "desirability weight" for each attribute. Finally the third step was applying an evaluation method for soluble coffees, based on the intensity of the main flavor attributes.

A Sensory Lexicon for Soluble Coffee

Finding Relevant Flavor Attributes in Soluble Coffee

The application of Sorting detected 15 important sensory attributes in soluble coffees, which resulted in 3 sensorially distinct groups, with specificities within each of them.

Sweetness	5.11
Acidity	5.00
Woody	-5.02
Floral	5.08
Herbaceous	4.98
Nuts	3.37
Spices	0.57
Fruity	4.99
Chocolate	2.86
Honey	4.78
Aftertaste intensity (potency)	-4.34
Astringency	-4.93
Bitterness	-5.14
Intense Extraction	-5.03
Body	0.00

Table: Coordinates (weights) of flavor attributes along F1 PCA. Signal was reversed to make "desirable" attributes positive and "undesirable", negative.

INTENSITY LEVEL	DESCRIPTION
0	Absence
1	Very low
2	Low
3	Medium/Moderate
4	High
5	Very high

Table: Intensity scale used for flavor attributes

Soluble Coffee Quality Assessment System

The Soluble Coffee Quality Assessment System has several characteristics:

1. It is based on studies carried out by ABICS and ITAL.

2. A quality index for each soluble coffee is obtained. However, the quality score is not an affective rating, based on the cupper's opinion, but rather a weighted score, based on the intensity of the main discriminating attributes. This makes the quality score objective and replicable by any panel trained using the same benchmark.
 3. The quality score is primarily used to determine quality degree along the scale, although it can also be communicated to consumers.
 4. The weight of each attribute was determined based on its coordinate on the F1 axis of the Principal Components Analysis. This means that attributes with the highest weight are the main drivers of quality perception among expert cuppers.
 5. The desirable and relevant attributes that a particular coffee presents in medium/moderate to very high intensities can also be communicated to consumers, with the certainty that these attributes will be noticed in the products.
1. The sample should be evaluated by a group of 3 to 4 trained soluble coffee cuppers. Cuppers must have been previously trained and calibrated on the evaluation of the lexicon's attributes, using a 0 to 5 scale.
 2. Soluble coffee samples should be prepared with 16 g of soluble coffee per liter of water at 85°C. The beverage should be kept in a thermos and served in individual glasses for the different cuppers at the time of the tasting, or in specific cups, and the evaluation should be carried out using tasting spoons.
 3. Tasters' results must be registered in a spreadsheet or app.
 4. Results for each attribute are averaged and rounded to the nearest whole number.
 5. Average intensity of each attribute should be multiplied by its weight, according to the table – this is the score of each attribute. The scores of all attributes are added and 122 is added to the result, so that the final score is always a positive number. This is rounded to the nearest whole number.

The general protocol for soluble coffee evaluation, according to this methodology, is summarized below:



6. The degree of coffee quality is determined based on its final score, according to the following criteria:

Scores from 0 to 102:

Classic soluble coffee

Scores from 102 to 142:

Premium soluble coffee

Scores from 142 to 306:

Excellent soluble coffee

See example below:

ATTRIBUTE	AVERAGE VALUE	WEIGHT	SCORE
Sweetness	3*	5.11	15.33
Acidity	3*	5.00	14.99
Woody	1	-5.02	-5.02
Floral	0	5.08	0.00
Herbaceous	2	4.98	9.97
Nuts	3*	3.37	10.12
Spices	2	0.57	1.15
Fruity	2	4.99	9.99
Chocolate	2	2.86	5.71
Honey	0	4.78	0.00
Aftertaste intensity (potency)	2	-4.34	-8.68
Astringency	2	-4.93	-9.86
Bitterness	2	-5.14	-10.28
Intense extraction	3	-5.03	-15.08
Body	1	0.00	1.00
Sum (total)			19.33
Quality score (adding 122 and rounding)			141
		GRADE	PREMIUM

Sample preparation

For evaluations in **cup tastings**, samples must be prepared according to the following proportions:

- 1 2.4g of powder for 150 ml of water at 85°C
- 2 Prepare 3 cups of each sample
- 3 Olfaction/smelling of the sample's volatile aromas
- 4 Start note taking
- 5 Use a spoon for the beverage
- 6 Transport the liquid to the spoon that will be taken to the mouth
- 7 Finalize assessments

For evaluations using **thermoses**, samples should be prepared according to the following proportions:

- 1 14.4g of powder for 900ml of boiling water or 16g for 1000ml
- 2 Prepare 1 liter of beverage of each sample for the thermos
- 3 Use an exclusive cup for each sample
- 4 Olfaction/smelling of the sample's volatile aromas
- 5 Start note taking
- 6 Tasting of the coffee
- 7 Finalize assessments

Proportion table
(water and instant coffee)

ML	G
1000ml	16g
900ml	14,4g
750ml	12g
500ml	8g
250ml	4g
100ml	1,6g
50ml	0,8g



APPLICATION AND USES OF INSTANT COFFEES FOR THE FINAL CONSUMER

Instant coffee is often used in mixes to be prepared with water or milk, known as 3 in 1 or 2 in 1 coffee mixes. The 3 in 1 is composed of instant coffee, chocolate powder and milk powder; 2 in 1 is composed of instant coffee and milk powder. These mixes are often commercialized as cappuccinos or coffee with milk, and are often sold in supermarkets; they are also frequently used in food service – hotels, hair salons, etc – as a good and practical alternative. This type of product has longer expiration dates and their practicality avoid losses and waste.

Besides being sold in pots, instant coffee also comes in capsules known as “multi-beverages”, suitable for machines that prepare not only coffee, but also coffees with milk, cappuccinos and moccaccinos. There is a combination of several ingredients within the capsule, resulting in a tasty and nutritious cup for the final consumer.

Other products that also use instant coffee as ingredient are: cereal bars with dried fruits, functional food products for sports, etc.

Preparation Tips

In Brazil, where the consumers appreciate stronger coffees the recommendation is 1 teaspoon of instant coffee for 50ml of boiling water. For other consumers around the world, this measure may vary (use more or less coffee, depending on the individual taste).



Use a teaspoon for measurement;



Heat the water until approximately 85° C. There is no need to boil the water.



Close the coffee pot firmly; moisture is an enemy of instant coffee: the product can absorb it and change color, texture and flavor.



After opening the package, keep it in the fridge (or even in the freezer).



To obtain a milder flavor, dilute the coffee in cold water in the cup, and stir well, then pour the hot water.

With milk and plant based beverages

A very common way of consuming instant coffee at home is with milk. Since we often drink coffee with milk in larger cups (mugs) – of around 150 to 200ml – the quantity of instant coffee also tends to be increased. It is important to remember that this is also a matter of personal taste.

The recommendation is 2 teaspoons of instant coffee for each 150ml of milk, which corresponds to 3 to 4 grams per cup, on average.

Another important factor is the product's solubility: in agglomerated coffees it is usually higher and faster than in freeze dried.

These same recommendations apply to plant based beverages, like soy, almond, rice or nut milk, etc. Each one of them has a unique flavor that harmonizes with all coffees.

Applicability

Despite being highly consumed with milk, instant coffee applicability is very wide, with possible uses in gastronomy and confectionery as a versatile ingredient for cakes, puddings, meringues and more. It can also be an ingredient in cold cocktails, being diluted directly in cold water and used in large volumes.

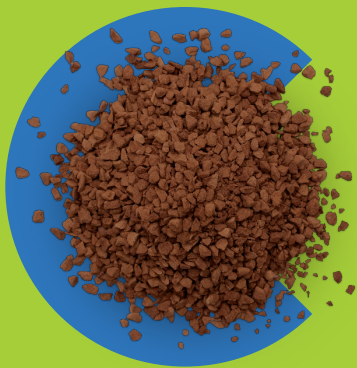
Other ingredients, besides dairy milk, also harmonize well with it, like plant based beverages made from almonds, nuts and rice, at any temperature.

After knowing all the technology involved in the making of instant coffee, baristas can feel free to **explore** their own coffee recipes and **enjoy** them with clients and friends. The brand "Explore & Enjoy" comes exactly to represent all of this creativity and versatility.



EXPLORE
& **ENJOY** INSTANT
COFFEE
BRAZIL

RE



IPES

Coffee with Whisky (Bartender Bertone's Recipe)

- 1 teaspoon of freeze dried instant coffee
- 40 ml of "cachaça" (sugar cane spirit) or American whisky
- 20 ml of brown sugar syrup
- 20 ml of lime juice
- 4 drops of Angostura bitter
- 2 slices of lemon
- 1 sprig of rosemary
- Ice

How to prepare it: Shake the coffee, the "cachaça" or whisky, the syrup and the lime juice, and pour in a glass or mug. Add the Angostura bitter, the lemon slices and the rosemary sprig.

Dalgona Coffee

- 2 tablespoons of instant coffee
- 2 tablespoons of sugar
- 2 tablespoons of boiling water
- Milk to serve

How to prepare it: Mix the coffee, sugar and water in a mixer or with a fouet (egg whisker) until forming a dense and thick cream. Pour milk in a cup and cover with the coffee cream. You can add sweet sauces, like caramel or chocolate, and serve with biscuits.



EPILOGUE

The challenges of the coffee production chain are huge, and in each one of them we are faced with novelties and unique specificities, shaped by different and exclusive realities. The universe of instant coffee is equally interesting, seductive, and technological, with highly qualified professionals.

The world of instant coffee is also fascinating because it uses only two ingredients: water and coffee combined with the laws of physics – pressure and temperature. Based on these factors, all of the Brazilian coffee aromas and flavors can be found in cups all around the world, making Brazil the largest exporter of instant coffees since 1953.

I hope that I managed to share with you another perspective of such a national and highly complex product! Do explore this experience, appreciate its flavors, create your recipes and appreciate it with friends and clients!

Sincerely,

Eliana Relvas

For additional information, watch the institutional video of instant coffee by scanning the code below with your smartphone camera or QRCode app.



BIBLIOGRAPHICAL REFERENCES

www.abics.com.br

Sivetz, Michael. Coffee Technology. Connecticut THE A VI Publishing company, inc. 1979

<http://abic.com.br/institucional/legislacao> (BASE OF THE INFORMATION)

www.ufrgs.br/alimentus1/feira/proutro/cafesol/fluxogra.html (HISTORY, DEFINITION, RAW MATERIAL, FLOWCHART AND MANUFACTURERS)

http://abic.com.br/src/uploads/2017/07/CONS_leg_instnormativa08-03.pdf
(MAPA – Ministry of Agriculture, Livestock and Food Supply – Normative Instruction N° 8, of June 2003 (COFFEE IDENTITY AND QUALITY STANDARDS))

<http://abic.com.br/src/uploads/2017/07/Resol007-2011-Micotoxinas.pdf> (ANVISA – RDC N° 7, of February 18, 2011 (MYCOTOXINS OF FOOD PRODUCTS))

www.anvisa.gov.br/anvisaegis/portarias/130_99.htm (Reference to ANVISA's decree - RDC N°130)





Av. Paulista, 1313, 9º andar
Conjunto 904
São Paulo/SP - CEP 01311-923
✉ secretaria@abics.com.br
☎ +55 (11) 3251-2883

📷 [abics.soluvel](#)
📘 [abicsoficial](#)
▶ [ABICS Café Solúvel do Brasil](#)