



BRPTO/DIRPA Ordinance #16

SEPTEMBER 2, 2024

Republish the Examination Guidelines for Patent Applications – Contents of the Patent Application.

The DIRECTOR OF PATENTS, SOFTWARE, AND INTEGRATED CIRCUIT TOPOGRAPHIES

In the exercise of the powers conferred on him by Executive Order #11.207, of September 26, 2022, and Article 93, Item V, of the BRPTO By-Laws, BRPTO/PR's Ordinance #09 of March 6, 2024, and CONSIDERING the contents of case record #52402.011283/2023-91,

HEREBY RESOLVES AS FOLLOWS:

Article 1. Republish the examination guidelines for patent applications – Contents of the Patent Application (Block I).

Article 2. Rule #124/2013 is hereby repealed.

Article 3. This Ordinance repeals BRPTO's Ordinance #15, of AUGUST 29, 2024, which republishes the Examination Guidelines for Patent Applications – Contents of the Patent Application.

Article 4. This Ordinance shall come into force 30 (thirty) days after its publication date in the BRPTO's Official Gazette.

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ANNEX



Examination Guidelines for Patent Applications

Contents of the Patent Application

Title, Specification, Set of Claims, Drawings, and Abstract

Block I

Chapter I - Title

1.01 The title of the Application must concisely, clearly, and precisely define the technical scope of the invention, and must be the same for the request, specification, abstract, and sequence listing, if any. The Examiner must assess whether the title adequately represents the different claim categories. There is no need for every independent claim in the same category to be represented in the title.

Example: If an application has more than one alternative for the same independent claim category, such alternatives may be represented together.

1.02 If the claims are subject to changes in category, the title must be changed accordingly. If an objection regarding the title is raised in an office action, the Examiner may suggest a new title.

Chapter II - The Specification

Manner of Presentation

2.01 The examiner must ascertain whether the manner of presentation of the specification meets the following requirements:

- starts with the title;
- specifies the technical field to which the invention relates;
- indicates and describes the background art deemed relevant by the applicant for understanding the invention; highlights existing technical problems;
- discloses the invention as claimed so that the technical problem and its solution may be understood, and establish any advantageous effects of the invention in relation to the background art;
- clearly highlights the novelty and the technical effect achieved;
- lists the figures presented in the drawings, specifying their graphic representations, such as views, sections, circuit diagrams, block diagrams, flowcharts, graphs, etc.;
- describes the invention in a manner sufficiently consistent, accurate, clear, and complete for the invention to be carried out by one skilled in the art, making reference to the reference signs contained in the drawings, if any, and, where appropriate, using examples and/or comparative tables, relating them to the background art;
- highlights, when appropriate, the best mode for carrying out the invention, as far as known to the applicant, on the date of filing or priority, if any. The best mode of execution applies to all elements considered essential to the invention, even if they are not claimed.

Example: An invention relates to an elastomeric seal and respective treatment method for manufacturing said seal. This method, although not claimed, if considered essential to achieve the differentiating features presented by the seal, must be described in the specification since, without a description of the method, the claimed seal cannot be implemented.

- i. explicitly indicates, unless inherent in the description or depending on the nature of the invention, the manner in which the invention may be used or produced by any type of industry.

2.02 The examiner may allow a presentation other than the manner specified above only when this allows

a better understanding of the invention.

Prior Art

2.03 The specification must include a description of the prior art relevant to the invention, which may be useful to understand the invention, to the search, and to the examination of the invention.

2.04 Documents cited as representative of the prior art, which can be either patent or non-patent literature, such as scientific articles, journalistic materials, and conference proceedings, must be identified.

2.05 As a result of the examination, the Examiner may require the applicant to include references to prior art documents in the Specification of the Application, such as documents found during the search, provided that the content of these documents does not extend beyond that of the invention as originally filed with the application.

Technical Problem to be Solved by the Invention and Evidence of the Technical Effect Achieved

2.06 The invention must be so described as to allow the technical problem and its proposed solution to be understood. In order to meet this condition, only details considered necessary for elucidating the invention should be included.

2.07 Pursuant to the Ordinance in force, an invention must solve technical problems by providing the solution to such problems, and it must have a technical effect. It is thus necessary to highlight the technical nature of the problem to be solved by the proposed solution. The effects achieved in order to obtain an invention can be demonstrated later as long as they do not represent addition of new subject matter.

2.08 Patent applications should not necessarily describe the optimal solution to the problem to which it relates and should not necessarily imply that the technical solution is an advance in relation to the state of the art. Thus, the proposed solution may simply be the seeking for an alternative, which can achieve the same results through different technical paths, as long as the patentability requirements are met.

2.09 Prior art documents identified subsequent to filing, i.e., during the search or submitted in third-party observations, may cause the application to have its technical problem reformulated, and/or replaced by another technical problem. In this case, provided that this reformulation can be derived by one skilled in the art and is inherent to the initially disclosed subject matter, based on the application as filed, such documents may be included in the specification so as to demonstrate the contribution of the invention to the state of the art.

2.10 The word "inherent" requires that undescribed subject matter be necessarily implied in the application as filed, and would be so recognized by one skilled in the art. Such inference cannot be established by probabilities or possibilities. The mere fact that something may result from a given set of circumstances is not sufficient.

2.11 The reformulation of the technical problem, as described in the previous paragraph, cannot be included in the set of claims. However, this may result in adding to the set of claims features originally present only in the specification, drawings or abstract at the time of filing, provided that this does not imply an expansion of the scope of the claimed subject matter.

Industrial Application

2.12 The specification should explicitly indicate the way in which the invention can be industrially exploited, if this is not inherent in the specification or the nature of the invention.

Sufficiency of Disclosure

2.13 Sufficiency of disclosure must be assessed based on the specification, which must present the invention in a sufficiently clear and precise way, to the point of being reproduced by one skilled in the art. The specification must satisfy sufficient conditions to ensure the accomplishment of the claimed invention.

2.14 The definition of "one skilled in the art" is broad. A person skilled in the art may be someone with average knowledge on the art in question at the time the application was filed, at a technical-scientific level, and/or with practical operational knowledge of the subject. It is considered that they had the means and the capacity for routine work and experimentation, which are usual in the technical field in question. There may be cases where it is more appropriate to think in terms of a group of people, such as a production or research team. This may particularly apply to certain advanced technologies such as computers and nanotechnology.

2.15 In this context, it is necessary to ensure that the application contains sufficient technical information to enable one skilled in the art to:

- (I) - put the invention into practice as claimed, without undue experimentation; and
- (ii) - understand the contribution of the invention to the state of the art to which it pertains.

"Undue experimentation" is when one skilled in the art, based on what was disclosed on the invention, needs additional experimentation to carry out the invention.

2.16 The description of the theoretical basis justifying the functioning and outcomes achieved by the invention must be presented in the specification so as to better understand the invention, although this is not a determining factor for ensuring sufficiency of disclosure, given this criterion requires only the presence of a description that allows the invention to be implemented by one skilled in the art. Should such description be considered essential for the search and analysis of the application, and for a better understanding of the invention, it must always be present.

Deposit of Biological Material

2.17 When the Application relates to biological material essential for the practical accomplishment of the object of the application which cannot be described as provided in Article 24 of the Brazilian Patent Statute and when not accessible to the public, the specification must be complemented until its patent application is filled by depositing the material with an institution authorized by the BRPTO or indicated in an international agreement.

2.18 Should there be no institution in Brazil authorized by the BRPTO or indicated in an international agreement in force in Brazil, the applicant may deposit a biological material with any of the international depository authorities under the Budapest Treaty, which must be done until the filing date of the patent application, and such data must be mentioned in the specification of the patent application.

Sequence Listing

2.19 The applicant for a patent application having as its object one or more nucleotide and/or amino acid sequences which are essential for the description of the invention must represent them in a Sequence Listing, so that the sufficiency of disclosure, as provided in Article 24 of the Brazilian Patent Statute, can be assessed.

Subject Matter Initially Disclosed in the Specification

2.20 Article 32 of the Brazilian Patent Statute provides that to better clarify or define a patent application, the applicant may introduce changes to it until the request for examination is filed, provided that they are limited to the subject matter initially disclosed in the application. Disclosed subject matter is understood as the entire subject matter contained in the patent application as a whole: specification, claims, abstract, and drawings (if any).

2.21 Applicants are permitted to make amendments to the specification at any time, as long as limited to providing a better description of the state of the art, as well as eliminating incoherent aspects of the text.

2.22 The inclusion of data, parameters or features of the invention not encompassed by the originally filed application constitute additional subject matter and, as such, cannot be accepted.

Example 1: In a patent application related to a chemical composition containing several ingredients, an additional ingredient added to this composition would be deemed to constitute an improper addition of subject matter. Similarly, in a utility patent application describing a bicycle frame without specifying the type of material, an addition of subject matter would be constituted if the applicant requested an amendment describing such material as being aluminum, which is essential for the invention. In case such amendment represents only the state of the art, it would be accepted.

Example 2: In an invention relating to a type of rubber without explicitly disclosing anywhere, for example, that the rubber is elastic, an amendment to the specification mentioning this feature could be accepted without this constituting addition of subject matter, as this feature is inherent to any rubber for one skilled in the art at the time of filing.

2.23 Amendments to the specification which result from receiving a non-final office action issued by the BRPTO must be examined. Should the applicant submit voluntary amendments to the specification not directly resulting from the examination, they must also be examined and will be accepted, provided that they are limited to the subject matter initially disclosed in the application.

2.24 After the request for examination, voluntary amendments to the specification may be accepted, provided that they are limited to the subject matter initially disclosed in the application.

Use of Proper Names, Trademarks, or Trade Names

2.25 The use of proper names, trademarks, trade names or similar words is not permitted when such words merely refer to the origin or a set of different products.

2.26 Exceptions are when such words are accepted as standard descriptive terms. In this case, such words are allowed without the need for a further identification of the product to which they relate.

Reference Signs

2.27 Reference signs used in the drawings must be included in the specification.

2.28 The specification and drawings must be consistent with each other and the reference signs must be defined in the specification.

2.29 Reference signs must be uniform throughout the application.

Terminology

2.30 The specification must be clear and use terms acknowledged in the art. Technical terms that are rarely used or specially formulated may be accepted, provided that they are adequately defined and there is no equivalent ones acknowledged in the art.

2.31 The adoption of this criterion must be extended to encompass foreign terms, when there are no equivalent ones in Portuguese. Terms that already have an established meaning should not be used to mean something different, so as to avoid confusion.

2.32 The terminology must be uniform throughout the application.

Physical Dimensions and Units

2.33 When properties are used to characterize the subject matter, relevant units must be specified if quantitative considerations are involved. Should this be done through an established standard (e.g., standard mesh sizes) and a set of initials or a similar abbreviation is used to refer to such standard, this information must be properly included in the specification.

2.34 Units of weight and measurement must be expressed using the International System of Units, with their multiples and sub-multiples, except for terms that are strongly established in specific technical fields such as: Btu, mesh, barrel, inches. When such used unit differs from the practice established for the field and the International System of Units, the applicant must submit the respective conversion to the International System of Units.

2.35 Geometrical, mechanical, electrical, magnetic, thermal, optical, and radioactivity indications must comply with the provisions provided in the current General Table of Units of Measurement established by the competent Brazilian entity.

2.36 Chemical formulae and/or mathematical equations, as well as symbols, atomic weights, specific units, and nomenclature not contained in the General Table of Units of Measurement established by the competent Brazilian entity must comply with established practice in the sector.

2.37 The terminology, symbols, and unit system adopted must be uniform throughout the application.

Generic Statements

2.38 The use of generic expressions in the specification, such as vague and imprecise terms implying the extension of the claimed subject matter will not be admitted, based on Article 24 of the Brazilian Patent Statute.

2.39 In particular, an objection will be raised to any expression referring to the expansion of protection to encompass the “spirit” of the invention. An objection will also be raised to a “combination of features” or any expression implying that the invention refers not only to the combination as a whole, but also to individual features or sub-combinations thereof.

Reference Documents

2.40 Documents cited as references in patent applications may relate to the state of the art or to a part of the disclosure of the invention. Reference to documents from patent or non-patent literature that relates to the state of the art may be present in the originally filed application or be introduced at a later date (see Item 2.03).

2.41 When the reference document relates to the invention, the Examiner must firstly assess whether the contents of the reference document are in fact essential for implementing the invention, as understood by Article 24 of the Brazilian Patent Statute:

- (a) If not essential, the usual expression “included herein by reference” or any such expression may be maintained in the specification; and
- (b) should the subject matter in the referred document be essential to ensure sufficiency of disclosure, the examiner will request the suppression of said expression and the inclusion of the subject matter in the specification, as the specification of the application must be self-sufficient, *i.e.* capable of being understood regarding the essential features of the invention, without reference to any other document.

2.42 This inclusion of essential subject matter or essential features is nevertheless subject to the restrictions of Article 32 of the Brazilian Patent Statute, namely:

- (a) protection was initially claimed for such features in order to comply with Article 25 of the

Brazilian Patent Statute;

- (b) such features contribute to solving the technical problem underlying the invention;
- (c) such features clearly belong to the description of the invention contained in the application and thus to the contents of the application as filed; and
- (d) such features are precisely defined and identifiable within all technical information in the reference document.

2.43 Should the reference document be essential to implementing the invention, but not available to the public on the date of filing of the application, it will only be accepted as a reference if it has been made available to the public by the date of publication of the application. Should it be unavailable, the Examiner will question the sufficiency of disclosure of the application based on Article 24 of the Brazilian Patent Statute.

2.44 In the exceptional case of a patent application citing a published document that is deemed essential for the correct understanding of the invention, but which is not accessible to the examiner, preventing them from conducting a meaningful search without knowledge of the contents of said document, an office action will be issued for the applicant to submit said document. In this case, if the reference document is written in a foreign language, said reference document must be accompanied by a translation into Portuguese.

2.45 Should the copy of this document not be promptly submitted as required to comply with said office action, and should the applicant fail to convince the Examiner that the document is not essential to conducting a meaningful search, the Examiner will issue an examination opinion on the insufficiency of disclosure of the application resulting from the unavailability of said document, pursuant to Article 24 of the Brazilian Patent Statute.

2.46 Should a document be cited in an application as originally filed, the relevant contents of the reference document will be considered as part of the content of the application for the purpose of confirming prior filing against subsequent applications.

Chapter III - SET OF CLAIMS CLAIMS

Overview

3.01 The application must contain one or more claims, which must:

- define the subject matter for which protection is sought;
- be clear and precise; and
- be supported by the specification.

3.02 Based on the above, the number of independent and dependent claims must be sufficient to correctly define the object of the application.

Numbering

3.03 Claims must be numbered sequentially in Arabic numerals.

Form, Content, and Types of Claims

Preamble, Characterizing Expression, and Characterizing Part

3.04 As an invention generally consists of features that are already known as well as new features, in order to ensure easier understanding of what the invention represents, an independent claim must consist of:

- (i) - an initial part that corresponds to the title or part of the title corresponding to its respective category;

(ii) - when necessary, a preamble containing the characteristics already comprised by the state of the art; and

(iii) - necessarily, the expression "characterized in that" followed by a characterizing portion presenting the specific features of the invention.

3.05 This separation between known elements and new elements is intended to merely facilitate this distinction, as it does not alter the the claim's range or scope, which will always be determined based on the overall features presented in the preamble and the characterizing portion.

3.06 Attention must be paid to the fact that the novelty of the features presented after the expression "characterized by" must always be established in relation to the set of features deemed as known and defined in the preamble.

3.07 Should the preamble define features A and B as being associated with each other, and the characterizing portion defines features C and D, it does not matter if C and/or D are known per se but rather if they are known in association with A and B, *i.e.*, not only with A nor only with B, but with both. For instance, a machine has four distinct elements, A, B, C and D, and they are all known in the art. However, this machine, which is an association of such four elements, may be novel and non-obvious.

3.08 The wording of the preamble may be inappropriate in several situations, when the invention relates to:

- (i) - a specific combination of known components;
- (ii) - the modification of known processes by omitting or replacing a step, as opposed to adding a step;
- (iii) - the modification of known products by omitting or substituting an element, as opposed to adding an element; and
- (iv) - a complex system of functionally interrelated parts, the essence of the invention residing in such interrelation.

3.09 For the specific case of process patents, the set of sequential steps correctly defines the request. Thus, if some of the steps in this process are part of the prior art, it may be unfeasible to individually transfer them to the claim's preamble without burdening the claimed process with disorder and unintelligibility. Note that, in this case, the expression "characterized in that" must be correctly positioned.

Technical Features

3.10 Claims must be worded as a function of the "technical features of the invention", which means that claims may not contain features associated with commercial advantages or other non-technical aspects.

Example: A claim that describes a sneaker provided with a sole and sole-attaching means must describe the means that could be used for that purpose, such as buttons, velcro, etc. in the specification.

3.11 In a "means-plus-function" claim, the specification of the patent application must contain at least one embodiment disclosing the structural elements used to achieve such functions.

3.12 In accordance with the Ordinance in force, claims explaining the advantages and the simple use of the object are not accepted. Consequently, a distinction must be made between merely explanatory passages and relevant functional features.

3.13 It is not necessary for each of the features of the invention to be expressed only in terms of their structural elements, as functional features may also be included, provided that one skilled in the art has no difficulty in finding out such elements in order to achieve the function, at the time of the invention.

3.14 Claims related to the use of the invention, *i.e.*, the technical application as provided for in the specification, are permitted.

Formulas and Tables

3.15 The claims, as well as the specification, may contain chemical formulae or mathematical expressions, but not drawings. Claims may contain tables only when essential to the clarity of the claimed subject matter.

Types of Claims

3.16 There are only two types of claims: “product claims,” which relate to physical entities, and “process claims,” which encompass all activities in which a material product is needed to perform the process. An activity may involve material products, electricity and/or other processes, such as control processes.

3.17 Examples of “product claim” categories include: product, apparatus, object, article, equipment, machine, device, system of cooperating equipment, compound, composition, and kit; and “process claims”: process, use, and method.

3.18 Process and method are synonyms for all intents and purposes.

3.19 The same application may present claims in one or more categories, as long as they are linked by the same inventive concept.

Claim Drafting

3.20 The drafting of claims must:

- (a) begin with its category and must contain a single expression “characterized in that”;
- (b) clearly and accurately define, using positive sentences, every technical feature to be protected thereby;
- (c) be fully supported in the specification;
- (d) not contain any reference to the specification or drawings regarding the invention's features, such as “as described in part ... of the specification” or “as represented in the drawings”;
- (e) be accompanied by the respective reference signs in parenthesis as shown in the drawings when the application contains drawings depicting its technical features, if deemed necessary for a proper understanding thereof, noting that such reference signs impose no limitations on the claims;
- (f) be worded without full stops;
- (g) have no passages explaining the advantages and the mere use of the object, as this will not be accepted.

Independent Claims

3.21 Independent claims are those that aim to protect essential and specific technical features of the invention in its integral concept.

3.22 There must be at least one independent claim for each claim category.

3.23 The Examiner must bear in mind that the presence of claims from different categories which are worded differently but having apparently similar effects is an option of protection available to the applicant, which the Examiner should oppose with a rigorous approach, but rather focus on the unnecessary proliferation of independent claims.

3.24 Each independent claim must correspond to a given set of features that are essential to carrying out the invention and more than one independent claim in the same category will only be allowed if such claims define different sets of features and essential alternatives to the invention, linked by the same inventive

concept.

3.25 Interrelated independent claims in different categories that are linked by the same inventive concept, in which one of the categories is specially adapted to another, must be worded so as to clearly show their interrelation, meaning that expressions are used in the initial part of the claim such as: "Apparatus for carrying out the process as defined in claim...", "Process for obtaining the product as defined in claim...".

3.26 Examples of interrelated claims are:

- (i) - plug and socket for interconnection;
- (ii) - respective transmitter and receiver;
- (iii) - final and intermediate chemical products;
- (iv) - gene, gene construct, host, protein, and drug; and
- (v) - product and product use.

3.27 Independent claims must contain, before the expression "characterized in that", a preamble, when necessary, describing the features that are essential to the definition of the claimed subject matter and already comprised in the state of the art (see 3.04).

3.28 The essential and specific technical features for which protection is sought must be defined after the expression "characterized in that", together with the aspects addressed in the Preamble (see Item 3.04).

3.29 Independent claims may serve as a basis for one or more dependent claims and must be grouped by category.

Dependent Claims

3.30 Dependent claims are those including every feature of other preceding claim(s), and define details of such features and/or additional features that are not deemed to constitute the essential features of the invention, necessarily containing an indication of the dependency on such claim(s) and the expression "characterized in that".

3.31 Dependent claims cannot extend beyond the definition of the features encompassed by the claim(s) to which they relate.

3.32 Dependent claims must accurately and comprehensively define their dependence relations. Wordings such as "according to one or more claims...", "according to the preceding claims...", "according to any of the preceding claims", "according to one of the preceding claims" or the like are not accepted. Wording such as "according with any one of the previous claims" is accepted.

3.33 Any dependent claim that relates to more than one claim, *i.e.*, a multiple dependence claim must be linked to such claims in an alternative or cumulative manner, provided that the dependency relationship between claims is structured so as to allow an immediate understanding of the possible combinations resulting from such dependency.

3.34 Multiple dependent claims, either as alternatives or additions, may serve as a basis to any other multiple dependent claims, provided that the dependency relationship between the claims are structured so as to allow an immediate understanding of the possible combinations resulting from such dependency.

3.35 All dependent claims relating to one or more previous claims must be grouped so as to ensure that the set of claims has a concise structure.

Clarity and Accuracy of Claims

General

3.36 The clarity condition of claims applies to individual claims and to the set of claims as a whole. The clarity of the claims is of the utmost importance, as they define the subject matter for which protection is sought. Thus, the meaning of terms contained in the claims must be clear to one skilled in the art based on the wording of the claim and on the specification and drawings, if any. In view of the differences in the scope of the protection obtained by various claim categories, the examiner must ensure that the wording of the claim is clear for the category it represents.

3.37 Claims are interpreted on the basis of the specification and drawings (and sequence listings, if any), as well as of the general knowledge of one skilled in the art by the filing date. When the specification defines any particular term that appears in the claim, this definition is used to interpret the claim.

3.38 For Markush-type claims, the Examiner must ensure that the obtaining processes described in the specification substantially enables the preparation of all the claimed compounds, *i.e.*, the examples must represent all claimed compound classes and must be sufficiently described in the specification.

3.39 In cases in which one skilled in the art cannot carry out the invention as claimed or should this require improper experimentation efforts, generic claims must be limited to the forms of implementation mentioned in the specification.

Discrepancies – Support in the Specification and Figures

3.40 Any discrepancies between the specification and the set of claims must be avoided, as this makes the extent of protection dubious and indicates that the set of claims is unclear or not properly supported in the specification. Such discrepancies can be of the following types:

(i) - Simple verbal inconsistency – When the specification is necessarily limited to a specific feature but the claims fail to comply with this limitation, the inconsistency may be remedied by adapting the set of claims to the specification, thus restricting its scope, pursuant to Article 25 of the Brazilian Patent Statute, with particular attention to Article 32 of the Brazilian Patent Statute. Should the specification relate to a specific feature, such as screws, for example, and the set of claims mention general means for fixing and should the Examiner find that the invention is not necessarily limited to screws, the specification and the set of claims will be understood as consistent. Another situation occurs when the claim has a limitation but the specification does not highlight this feature. In this case, the specification and the set of claims are inconsistent with one another.

(ii) - Discrepancy related to apparently essential features – should it be generally known in the art or constitute established expertise, or should it be implicit in the invention that a certain technical feature in the specification is considered essential to carry out the invention but this is not mentioned in an independent claim, this claim must not be allowed by the Examiner, pursuant to Article 25 of the Brazilian Patent Statute.

Generic Statements

3.41 As in the specification, generic statements in the set of claims implying that the scope of protection may be broad, vague, and imprecisely defined are not allowed, pursuant to Article 25 of the Brazilian Patent Statute. More specifically, objections must be raised to any statement referring to the scope of protection being extended so as to encompass the “spirit” of the invention. Objections must also be raised to claims directed to a combination of features, for any statement that seems to imply that the claimed protection covers not only the combination as a whole but also individual features or sub-combinations thereof.

Essential Features

3.42 Independent claims must explicitly specify every essential feature needed to define the invention, unless such features are made implicit by using generic terms. *i.e.*, a “bike” does not need to mention the presence of wheels.

3.43 Should a claim relate to a product of a well-known type and the invention consist in modifying certain aspects, it is sufficient that the claim clearly identifies the product, specifying what is modified and how. Similar considerations apply to apparatus claims.

3.44 The patentability of the invention depends on the technical effect achieved. Thus, claims must be worded so as to include every technical feature contained in the specification and considered essential to achieving said technical effect.

Use of Relative and/or Imprecise Terms

3.45 The use of relative terms such as “large,” “broad,” “strong,” among others, is not permitted in claims, except when it is well established in a specific field, such as “high-frequency” for an amplifier, and this is the intended meaning. Any relative term that does not have this meaning must be replaced by a more precise term or by another that has already been described in the specification as filed.

3.46 Imprecise words or expressions such as “about”, “substantially”, “approximately”, among others, are not permitted in claims, regardless of whether they are deemed essential to the invention.

3.47 Should relative terms or imprecise expressions be used in the claim, the Examiner must make an objection for lack of clarity. Counter-arguments submitted by the applicant stating that elements missing from the text are part of the prior art will not be accepted, as problems related to a lack of clarity will remain. Furthermore, the inclusion of such elements in the text is considered additional subject matter and is consequently not permitted.

“Consisting” versus “Comprising”

3.48 The terms “constituted of” and “consisting of” as well as derivatives thereof are considered closed terms defining the invention. That is, if a claim is for a “chemical composition characterized in that it consists of components A, B, and C”, the presence of any additional components is excluded.

3.49 The terms “comprising”, “containing”, “encompassing”, and “including”, as well as the derivatives thereof, are considered open terms for defining the invention, meaning that, in the example above, the sentence “characterized in that it comprehends components A, B, and C” is not limited only to these elements, and may be accepted, provided that such elements are essential to carry out the invention.

Optional Features

3.50 Expressions such as “preferably”, “for example”, “such as”, and “more particularly” or the like must be examined with special attention in order to ensure that they do not introduce any ambiguity. These expressions do not have a limiting effect on the scope of a claim, *i.e.*, the feature following any expressions such as these must be considered as fully optional.

Example: In a process claim for a temperature parameter “...in the range of 80 °C to 120 °C, preferably 100 °C”, the term “preferably” is not ambiguous.

Proper Names, Trademarks, or Trade Names

3.51 Proper Names, Trademarks, or Trade Names in claims should not be allowed, as there is no guarantee that the product or feature associated with a brand or similar cannot be modified during the term of the

patent. They may be exceptionally authorized if their use is unavoidable and if they are generally recognized as having a precise meaning.

Definition of the Subject Matter of Protection in Terms of the Result to be Achieved

3.52 As a general rule, claims defining the invention by means of the result to be achieved should not be allowed, in particular if they are limited to claiming the involved technical problem. However, they may be permitted should the invention be defined only in such terms or should it be more precisely defined without unduly restricting the scope of the claims, and if the result is such that it can be directly and positively verified by tests or procedures properly specified in the specification, or known to a person skilled in the art, and not require undue experimentation.

Example: A claim for a material characterized in that it is capable of extinguishing cigarette flames, the specification of which describes the chemical composition of such material, could not be accepted, given that the material can be characterized by its chemical composition, and not by the result to be achieved by the invention.

3.53 Note that the requirement above for defining the subject matter of protection in terms of the result to be achieved is different from those for defining the subject matter of protection in terms of functional features (see Item 3.97).

Definition of Subject Matter of Protection in Terms of Parameters

3.54 Parameters are characteristic values that may be directly measurable properties, such as the melting point of a substance, the tensile strength of steel, the resistance of an electrical conductor, or it may be defined as mathematical combinations containing several variables provided for in formulae.

3.55 The characterization of a product by its parameters may be permitted only when the invention cannot be adequately defined in any other manner, and provided that these parameters can be clearly and reliably determined, either by means of indications in the specification or by means of objective procedures that are common in the prior art. The same applies to process-related features defined by parameters.

3.56 Cases in which uncommon parameters are used, even if sufficiently described, are initially unacceptable due to a lack of clarity, as no significant comparison with the previous technology can be drawn. Such cases may also mask a lack of novelty. In these cases, the applicant must demonstrate, in the specification, the balance between said uncommon parameter(s) as used with regard to those from the prior art, which does not constitute additional subject matter.

3.57 Cases in which the method and means of measurement used for the parameters must also be included in the claim are addressed in Item 3.58.

Methods of and Means for Measuring Parameters Referred to in Claims

3.58 The invention must be fully defined in the claim itself. In principle, the measurement method is necessary for a clear definition of the parameter. However, methods and means for measuring parameter values are not required in the claims when:

- (i) - the description of the method is so long that its inclusion would make the claim difficult to understand or unclear through lack of conciseness;
- (ii) - one skilled in the art would know which method to employ, e.g., because there is only one method, or because a specific method is commonly used; or
- (iii) - all known methods yield the same result – within the limits of measurement accuracy.

3.59 However, in all other cases, the method of and means for measurement must be included in the

claims, as they define the subject matter for which protection is sought.

Product-by-Process Claims

3.60 Product claims defined in terms of a manufacturing process are allowed only if the products comply with patentability requirements, meaning that they are novel and non-obvious, and provided that the product cannot be described in another manner. A product is not considered novel merely because it is produced using a novel process. With regard to the analysis of novelty, a claim for product X obtained by process Y lacks novelty when a prior filing for this same product X is found, regardless of how it is obtained.

3.61 A claim defining a product in terms of a process must be construed as a product claim. The claim may, for instance, take the form “product X characterized in that it is obtained by process Y.” Regardless of whether the term “obtain,” “obtained,” “directly obtained,” or an equivalent wording is used in the product-by-process claim, the claim is still directed to the product *per se* and confers full protection upon the product. This type of claim may be accepted only when it is not possible to adequately define the product *per se*, but only through the manufacturing process.

*Example: A material is prepared that includes a new sintering step. The resulting product has distinguishing features of greater mechanical strength when compared to materials from the prior art with the same nominal composition but the applicant cannot describe the material *per se*. In this case the product may be described in terms of the product obtained by the process.*

Definition by Reference to Use or Another Object

3.62 When a product claim (see Item 3.16) defines the invention by reference to features relating to the use thereof, this may result in lack of clarity.

3.63 Consider a case in which the claim not only defines the product itself but also specifies its relationship to a second product that is not part of the claimed product.

Example: A cylinder head for an engine, wherein the former is defined by features of its location in the latter.

3.64 Before considering a restriction to the combination of the two products, it should be remembered that the applicant is entitled to independent protection of the first product.

Example: A claim for a “cylinder head connected to an engine” may not be changed to a “cylinder head connectable to an engine,” nor to the cylinder head alone, as this does not comply with Article 32 of the Brazilian Patent Statute, even when this change is grounded in the initially disclosed specification.

3.65 On the other hand, given that the first product can often be produced and marketed independently of the second product, an initially claimed “cylinder head connectable to an engine” may be changed to a “cylinder head connected to an engine” or to the cylinder head itself. Should it not be possible to provide a clear definition of the first product *per se*, then the claim should be directed to a combination of the first and second products – “Cylinder head connected to an engine” or “engine with a cylinder head.”

3.66 It may also be allowable to define the dimensions and/or shape of a first object in an Independent Claim by general reference to the dimensions and/or corresponding shape of a second object that is not part of the first entity claimed but is related to it through use. This is especially applicable when the size of the second object is standardized in some way.

Example: In the case of a support rack for a vehicle number plate, wherein the support frame and the fixation elements are defined in terms of the external shape of the plate.

3.67 However, references to second entities that cannot be viewed as standardized may also be sufficiently clear in cases where one skilled in the art would have little difficulty in inferring the limitation resulting from the field of protection for the first object.

Example: In the case of a roof for a circular farm stall, wherein the length and width of the roof are defined on the basis of the dimensions of the stall.

3.68 There is no need for such claims to contain the exact dimensions of the second entity nor to refer to a combination of the first and second entities. Specifying length, width and/or height of the first entity, with no reference to the second entity, would lead to an improper restriction of the scope of protection.

The term "in"

3.69 In order to avoid ambiguity, the word "in" must be examined with special attention to claims in which it defines relationships among different physical entities (product, equipment) or among entities and activities (process, use) or among different activities. Examples of claims using the word "in" in this context are:

- (i) - A cylinder head in a four-stroke engine, characterized in that...;
- (ii) - A dial tone detector in a telephone apparatus with an automatic dialer, the dial tone detector characterized in that...;
- (iii) - A method for controlling current and voltage in a process using an electrode feeding means of an arc welding equipment, characterized in that it comprises the following steps:...; or
- (iv) - Improvement X... in a process/system/equipment etc. characterized in that...

3.70 For claims of the type indicated by examples (i) to (iii), the emphasis is on the full functionality of the sub-units, namely: "engine cylinder head, dial tone detector, method for controlling arc welding current and voltage" rather than the complete unit within which the sub-unit is contained: four-stroke engine, telephone, welding process. This may constitute lack of clarity if the requested protection is limited to the sub-unit *per se* or if the unit as a whole must be protected.

3.71 For the sake of clarity, claims of this type must be directed either to "a unit with – or comprising – a subunit," *i.e.* "a four-stroke engine with a cylinder head" or to the sub-unit *per se*, specifying its purpose: "cylinder head for a four-stroke engine".

3.72 In claims of the type indicated through example (iv), the use of the word "in" does not clearly indicate whether protection is sought for the improvement only or for all features defined in the claim. Here, too, it is essential to ensure that the wording is clear. However, claims such as: "use of substance X characterized in that it is a paint or varnish composition" are acceptable on the basis based of a second use.

Use Claims

3.73 For the purposes of examination, a "use" claim in a form such as "use of substance X as an insecticide," must be considered as equivalent to a "process" claim of the form "a process of killing insects using substance X" or also "use of an alloy X to manufacture a specific part." Thus, a claim in the form indicated is not to be interpreted as directed to substance X, which is known, but rather to its intended use as defined, namely as an insecticide, or for manufacturing a specific part. However, a claim directed to the use of a process is equivalent to a claim directed to the same process.

3.74 Independent claims such as a "product characterized by the use" in which the product is already known in the art are not accepted due to lack of novelty. Should a product not be known in the art, such wording of a claim is not accepted due to lack of clarity, pursuant to Article 25 of the Brazilian Patent Statute, as the product must be defined by its technical features (see Item 3.10)

3.75 In the pharmaceutical field, claims involving the use of chemical and/or pharmaceutical products for treating a new disease use a format conventionally known as the Swiss formula:

"Use of a compound of formula X, characterized in that it is to prepare a drug to treat disease Y".

3.76 Note that this type of claim confers protection on the use but not on the method of treatment, which is not considered an invention, pursuant to Item VIII of Article 10 of the Brazilian Patent Statute. Claims in the form of "Use for treating," "Process/method for treating," "Administration for treating," or equivalents are method of treatment claims and thus not considered inventions, pursuant to Item VIII of Article 10 of the

Brazilian Patent Statute.

Reference to the Specification or Drawings

3.77 With regard to the technical features of the invention, claims cannot refer to the specification or drawings, such as “as described in part... of the specification” or “as illustrated in Figure 2 of the drawings.”

Reference Signs

3.78 When the application contains drawings, the technical features defined in the claims must be accompanied by the respective reference signs, shown in parenthesis, as indicated in the drawings, should this be considered necessary for a proper understanding thereof. These reference signs are not to be construed as limiting the scope of the claims. In case there is a large number of alternatives for a single feature, only the reference signs required to understand the claim should be included.

3.79 Reference signs, numbers and/or letters must be included not only in the characterizing portion, but also in the preamble of the claims, provided that they accurately identify the elements to which reference is made in the drawings.

3.80 The addition of text to reference signs within the parentheses in the claims is not accepted. Expressions such as “securing means (screws 13, nail 14)” or “valve assembly (valve seat 23, valve element 27, valve seat 28)” are special features to which the concept of reference signs does not apply. Consequently, it may be unclear whether the features added to the reference signs are limiting or not. In this regard, the correct indication must be, for example: “the hose (4) is connected to the valve (10)” instead of “the hose is connected to the valve” or “4 is connected to 10.”

3.81 A lack of clarity can also arise with expressions in parenthesis that do not include reference signs, such as “(concrete) molded brick.” In contrast, expressions in parenthesis with a generally accepted meaning are acceptable, such as: “(meta)acrylate,” which is known as an abbreviation for acrylate and meta-acrylate. The use of parenthesis in chemical or mathematical expressions is also acceptable.

3.82 However, the opposite may be permitted, meaning that the drawings may have more reference signs than those contained in the set of claims.

Negative Limitations

3.83 Each claim must clearly, accurately, and positively define the technical features to be protected thereby, avoiding expressions that lend uncertainty to the claim.

3.84 However, negative limitations may be used only if the addition of positive features to the claim does not clearly and concisely define the matter for which protection is sought or if such addition unduly limits the scope of the application.

Example ¹: *Process for producing expandable polystyrene (EPS) in the form of beads through the polymerization of styrene in aqueous suspension in the presence of suspension stabilizers and polymerization starters soluble in conventional styrene... characterized in that polymerization is conducted in the absence of a chain transfer agent.*

Example ²: *Formula 1 compound, characterized in that R1 is halogen, with the exception of R1 being chlorine.*

Support in the Specification – Article 25 of the Brazilian Patent Statute

General remarks

3.85 Article 25 of the Brazilian Patent Statute provides that claims must be supported by the specification

by describing the specific features of the application and also clearly and accurately defining the subject matter for which protection is sought. This means that the subject matter of every claim must be supported by the specification, with the scope of the claims not extending beyond the contents of the specification and drawings, if any, based on the contribution to the state of the art.

Degree of Generalization in Claims

3.86 The appropriate wording of a claim must comply with the precision requirement provided in Article 25 of the Brazilian Patent Statute. Most claims are generalizations from one or more particular examples. The permitted degree of generalization is an issue that must be analyzed by the examiner in each case, in the light of the related prior art.

3.87 Claims for an invention opening up an entirely new field may typically be more extensively generalized than those directed to improvements in a well-known field of technology.

Objection of Lack of Support

3.88 A claim in generic form, *i.e.* relating to a whole class, *e.g.* of materials or machines, may be acceptable even if of broad scope, if there is fair support in the specification. Where the given information appears insufficient to enable one skilled in the art to implement the claimed subject matter by using routine methods of experimentation or analysis, the Examiner must raise an objection, requesting the applicant to present arguments showing that the invention can in fact be readily applied on the basis of the information given in the specification or, in the absence thereof, to restrict the claim accordingly.

3.89 Once the Examiner has established that a broad claim is not supported by the specification, the burden of demonstrating the contrary falls upon the applicant. In this case, the Examiner may seek support in a published document in order to provide grounds for their reasoning.

3.90 The question of support is illustrated by the following examples:

Example 1: A claim relates to a process for treating seedlings of all plant species by subjecting them to a controlled cold shock, so as to produce specific results but, in the specification, this process is applied only to a single plant species. As it is well known that plants vary widely in their properties, there are well-founded reasons to believe that the process is not applicable to all plant seedlings. Unless the applicant provides convincing evidence that the process is nevertheless suitable for general use, they must restrict the set of claims of the application to the plant species referred to in the specification. Merely stating that the process is applicable to all plant seedlings is not sufficient;

Example 2: A claim relates to a specific method of treating "synthetic resin mouldings" to obtain certain changes in the resin's physical characteristics. All the examples described relate to thermoplastic resins, and the method is such as to appear inappropriate to thermosetting resins. Unless the applicant can demonstrate that the method is nevertheless applicable to thermosetting resins, they must restrict the claim to thermoplastic resins; and

Example 3: A claim relates to fuel oil compositions that have a given desired property. The specification provides support for one way of obtaining fuel oils having this property, achieved by the presence of defined amounts of a certain additive. No other ways of obtaining fuel oils having the desired properties are disclosed in the specification. The claim makes no mention of the additive. In this case, the claim is not fully supported by the specification.

Lack of Support versus Insufficiency of Disclosure

3.91 Note that, despite an objection of lack of support being an objection under Article 25 of the Brazilian Patent Statute, it can often also be considered an objection of insufficiency of disclosure of the invention, under Article 24 of the Brazilian Patent Statute (see Item 2.13), as shown in the examples in Item 3.92. In this

context, the objection lies in the fact that the application as disclosed is insufficient to enable one skilled in the art to carry out the “invention” throughout the entire claimed scope, although it is sufficient for a more restricted “invention.” Both conditions are required to enforce the principle that the wording of a claim must be supported by the specification of the patent application.

3.92 Note that the sufficiency of disclosure of the invention must be ascertained only in the specification, while Article 25 relates to the set of claims being supported in the specification.

Definition in Terms of Function

3.93 A claim may broadly define a feature in terms of its function, *i.e.*, as a functional feature, even when only one example of the feature has been given in the specification, if one skilled in the art would consider that other means could be used for the same function (see also Item 3.10 and 3.53).

3.94 The sentence “means of detecting the terminal position” in a claim might be supported by a single example comprising a limit switch, as it is clear to one skilled in the art that a photoelectric cell or an strain gauge could be used instead.

3.95 However, should the entire contents of the application convey the impression that a function is to be performed in a particular way, with no indication that alternative means are envisaged, and a claim is formulated in such a way as to embrace other means, or all means, of performing the function, then such claim cannot be accepted. In this case, the specification does not support the set of claims when it merely and vaguely states that other means can be used, if there is no clear definition of what they might be or how they might be used, thus failing to comply with Article 25. It is thus necessary to redraft the claim to limit its scope.

Subject matter defined in the Set of Claims and not mentioned In the Specification

3.96 When the subject matter for which protection is sought is clearly disclosed in the claims submitted with the application as filed but not mentioned in any part of the specification, such subject matter may be included in the specification, provided that the contents thereof comply with Article 24 of the Brazilian Patent Statute.

3.97 The opposite situation, when subject matter is contained in the specification and not claimed before the filing of the request for examination of the application, it cannot be claimed at a later date, except for restricting the set of claims.

Unity of Invention – Article 22 of the Brazilian Patent Statute

General Considerations

3.98 The patent application must relate to a single invention or a group of inventions that are interrelated as to conceive a single inventive concept. When a patent application relates to a group of inventions that are so linked as to form a single inventive concept, this may give rise to a plurality of independent claims in the same category, provided that they define different sets of alternative features that are essential for implementing the invention (see Item 3.21).

3.99 A single inventive concept or unity of invention is understood as several claimed inventions having a technical relationship, represented by one or more of the same or corresponding special technical features for the claimed inventions.

3.100 The expression “special technical features” relates to the technical features that constitute a contribution that the claimed invention makes over the prior art at hand, interpreted based on the

specification and drawings, if any, and that are common or correlated to each of the claimed inventions. Once the special technical features have been identified for each of the inventions, it must be determined whether or not there is a technical relationship among the inventions that is conferred by said special technical features.

3.101 Note that, in an initial analysis, unity of invention must be considered among the independent claims of the patent application.

3.102 Should an independent claim be obvious or lack novelty, the other dependent claims must be analyzed not only in terms of merit, but also for the existence of a common inventive concept (see also Item 3.135).

3.103 Whenever an application lacks unity of invention, the Examiner must raise an objection based on Article 22 of the Brazilian Patent Statute.

Special Technical Features

3.104 The relationship among inventions provided by Article 22 of the Brazilian Patent Statute must be a technical relationship, which is expressed in the claims in terms of the same or corresponding special technical features. In any claim, the expression “special technical features” means one or more features that define a contribution made by the claimed intervention as a whole to the prior art at hand, construed based on the specification and the drawings, if any, and that are common or related to each of the claimed inventions. Once the specific technical features of each invention are identified, it is necessary to determine whether or not there is a technical relationship among the inventions, and whether or not this relationship involves these special technical features. There is no need for the special technical features of each invention to be the same. The required relationship may be found among corresponding special technical features.

Example: In a given claim, the special technical feature that provides resilience is a metal spring, whereas in another claim it is a block of rubber.

3.105 Interrelated elements must be specially adapted to each other. Should these elements have other applications, and should said relationship be merely one among several possibilities, it is understood that this is not the interrelation required to meet the unity of invention requirement.

Example: A claim directed to non-slip artificial grass is presented together with another claim for a soccer ball made from a material that is particularly suitable for this type of pitch, which may also be used on other types of grass or pitches. In this case, it is understood that there is no unity of invention, despite the ball having better performance on the specific pitch as mentioned.

3.106 A plurality of independent claims in different categories may constitute a group of inventions that are interrelated so as to form a single inventive concept. The following combinations of claims in different categories are permitted in a single application, as shown in the following examples:

Example 1: an independent claim for a certain product, an independent claim for a process specially adapted to manufacture said product, and an independent claim for a use of said product; or

Example 2: an independent claim for a certain process and an independent claim for an apparatus or means specifically designed to implement said process; or

Example 3: an independent claim for a certain product, an independent claim for a process specially adapted to manufacture said product, and an independent claim for an apparatus or means specifically designed to perform this process.

3.107 In a claim of the type indicated by example (i), the process is especially adapted to manufacture said product if the process results in the claimed product, *i.e.*, if the process really is appropriate for achieving the claimed product and thus defines a special technical feature between the claimed product and process. A manufacturing process and its product may not be considered as lacking unity of invention solely due to the fact that the manufacturing process is not limited to the manufacturing of the claimed product.

3.108 For a claim of the type mentioned in example (ii), the device or means specifically designed to

perform a process, should the device or means be appropriate to perform the process and thus define a special technical feature between the claimed device or means and the claimed process. On the other hand, it is irrelevant whether the device or means can or cannot be used to perform another process, or whether the process can also be performed using alternative devices or means.

3.109 Unity of invention is present in an application having claims in one or more distinct technical fields, provided that there is a common or corresponding “special technical feature” between such claims.

Example: An application has an independent claim for a polymer G, as well as another independent claim for a type of artificial grass made from the polymer G, for use on soccer fields. In this case, although involving different technical fields, there is unity of invention in the application, as the polymer G is a “special technical feature” that is common to these claims.

3.110 An application may contain more than one independent claim in the same category only if the subject matter for which protection is sought fits one of the following situations:

- (i) - a plurality of interrelated products;
- (ii) - different uses of a product or equipment; or
- (iii) - different sets of alternative features that are essential to implement the invention, linked by the same inventive concept.

3.111 Furthermore, it is essential that a single general inventive concept links the claims in various categories. The presence in each claim of expressions such as “specially adapted” or “specially designed” does not necessarily imply that a single general inventive concept is present.

Lack of Unity of Invention a Priori or a Posteriori

3.112 The lack of unity of invention may be directly evident *a priori*, i.e., considering claims without a search for prior art documents, or it may only appear *a posteriori*, i.e., after the prior art has been brought to light, which consists of documents that may be presented in the application, as well as those found during the search.

3.113 In *a posteriori* analysis of unity of invention, if one or more documents constituting the state of the art pertinent to the invention show that the special technical feature is known, the independent claims must be analyzed for the existence of some other special technical feature that is common among them (see also Item 3.135 for dependent claims).

3.114 A processing flowchart illustrating the analysis of the unity of an invention is shown in Appendix I of these Guidelines.

3.115 Should an application be considered as lacking unity of invention *a priori*, this must be reported by the examiner through a notification in a non-final office action, with remarks on how to clearly and accurately identify the different unities of invention found in the application, or unified and interrelated groups of inventions, notifying the applicant of the need to exclude claims that exceed the unity of the invention and/or the division of the application, as per Article 22 of the Brazilian Patent Statute [Item (i) of the flowchart]. In this case, a search report must be issued on the basis of the first claimed unity of invention. The Examiner must await a reply from the applicant, after which they may:

- (i) - reject the application due to a lack of unity and the absence of technical support provided by the applicant to justify the existence of the unity of invention and the application with no amendments; or
- (ii) - continue with an examination of the application, should the applicant submit convincing arguments for the existence of unity of invention, or should the set of claims have been limited to a single inventive concept.

3.116 Having considered the existence of unity of invention *a priori* through identifying the special technical feature found among the claims, the examiner must proceed with the search for this feature among the independent claims [Item (ii) of the flowchart]. Should this feature not be known in the state of the art, the application has unity of invention *a posteriori*, with the examiner necessarily supplementing the search for

the entire set of claims [Item (iii) of the flowchart], and then undertaking an examination on the merits of the application [Item (iv) of the flowchart]. Should this feature be known in the art, the Examiner must decide whether the conducted search was sufficient to encompass every subject matter claimed in the set of claims [Item (v) of the flowchart]. If so, the Examiner must proceed with the examination of merits of the application [Item (iv) of the flowchart]. Otherwise, the application does not have unity of invention *a posteriori*, with the examiner notifying the applicant as provided by Article 22 of the Brazilian Patent Statute [Item (vi) of the flowchart] and presenting a search report, proceeding in the same manner as for a lack of unity of invention *a priori*, by conducting a search [Item (i) of the flowchart].

3.117 The lack of unity of invention may not be raised nor pursued on the basis of a narrow approach. This is particularly valid in cases in which the Examiner notes that additional efforts made to perform the application search are limited (see Item (iv) of the flowchart in Appendix I).

3.118 An application having several classifications for its independent claims does not necessarily indicate a lack of unity of invention. A practical and broad analysis must be conducted of the level of inter-dependency among the presented inventions compared to the state of the art disclosed by the search report.

Intermediate and End Products

3.119 The status of unity of invention must be considered as present within the context of intermediate and end products, in which:

- (i) - the intermediate and end products have the same essential structural elements, meaning that their basic chemical structures are the same or their chemical structures are closely interrelated in technical terms, with the intermediate product including a structural element that is essential in the end product; and
- (ii) - intermediate and end products are technically interrelated, meaning that the end product is produced directly from the intermediate product or is separated therefrom by a small number of intermediate products, all containing the same essential structural element.

3.120 Unity of invention may also be present among intermediate and end products with unknown structures, *e.g.*, between an intermediate product with a known structure and an end product with an unknown structure, or between an intermediate product with an unknown structure and an end product with an unknown structure. In such cases, to comply with the criterion of unity of invention, there must be sufficient evidence to conclude that the intermediate and end products are closely and technically interrelated, *e.g.*, when the intermediate product contains the same essential element as the end product or embodies an essential element in the end product.

3.121 Different intermediate products used in different processes for preparing end products may be claimed, provided that they have the same essential structural element. Intermediate and end products may not be separated in the process leading from one to another by an intermediate product that is not new, which represents the special technical feature that grants unity of invention to the intermediate and end products. When different intermediate products for different structural parts of the end product are claimed, unity is not present among the intermediate products. If the intermediate and end products are families of compounds, each intermediate compound must correspond to a compound claimed in the family of end products. However, some end products may not have a compound corresponding to the family of intermediate products, meaning that these two families do not need to be completely congruent.

3.122 The mere fact that, in addition to the capability of being used to produce end products, the intermediate products also present other possible effects or properties, may not adversely affect the unity of the invention.

3.123 Intermediate products are illustrated in the following examples:

Example 1 *Claim 1: New compound having an A structure – intermediate compound*

Claim 2: Product prepared by reacting an intermediate compound of structure A with a compound X – end product

Example 2: *Claim 1: Reaction product of A and B – intermediate;*

Claim 2: Product prepared by reacting the intermediate compound with substances X and Y – end product.

3.124 For the types indicated in examples 1 and 2, the chemical structures of the intermediate and/or end products are unknown. In example 1, the structure of the product of Claim 2 – end product – is unknown. In example 2, the structures of the products of Claim 1 – intermediate and Claim 2 – end product – are unknown.

3.125 There is unity of invention when evidence is present leading to the conclusion that the end product's inventive feature depends on the intermediate product's features. Should the purpose of using the intermediate products in the types shown in examples 1 and 2 is to modify certain properties of the end product. The evidence may lie in the data included in the specification showing the effects of the intermediate product on the end product. Should there be no such evidence, then there is no unity of invention based on the relationship between the intermediate and end products.

Alternatives – “Markush Groupings”

3.126 When a Markush grouping is for alternatives for chemical compounds, they will be considered as being of similar nature, provided that the following criteria are met:

- (i) - all alternatives have a common property or activity; and
- (iii) - a common structure is present, *i.e.*, a significant structural element is shared by all the alternatives or, in cases where the common structure cannot be the only unifying criteria, all alternatives belong to a recognized class of chemical compounds in the art to which the invention pertains.

3.127 Verifying whether a group of inventions is interrelated as to constitute a single general inventive concept must be conducted separately should the inventions be claimed in separate claims or as alternatives presented in a single claim.

3.128 Alternative forms of an invention may be claimed either in a plurality of independent claims, as indicated in Item 3.108, or in a single claim. A claim, whether independent or dependent, may refer to alternatives, provided that the number and presentation of alternatives in a single claim does not make the claim obscure or hard to understand, and provided that the claim has unity of invention, *e.g.*, an engine characterized in that a gear A is manufactured with material X or Y or Z. In the case of a single claim, the presence of the alternatives as independent forms may not be immediately evident. However, in both cases, the same criteria must be applied in order to decide whether or not there is unity of invention, and the lack of unity of invention may also exist within a single claim.

Individual Features in a Claim

3.129 A claim has unity of invention when it consists of a combination of individual features, in which such features present a technical interrelation.

3.130 When this technical interrelation does not exist but there is a mere juxtaposition of elements, there are no grounds for alleging a lack of unity for the invention.

Dependent Claims

3.131 No objection of lack of unity of invention raised *a priori* is justifiable for a dependent claim, based on the general concept that the object of the independent claim is common therebetween, which is also contained in the dependent claim.

Example: Assume that *Claim 1 claims a turbine rotor blade in a specified manner, whilst Claim 2 claims a “turbine rotor blade as described in Claim 1, comprised of alloy Z.” The special technical features linking the dependent claim to the independent claim for the turbine rotor is the “turbine rotor blade shaped in a specific manner.”*

3.132 When an independent claim is not patentable, the unity of invention among its dependent claims must be carefully considered. The other remaining dependent claims must be assessed to see whether they have “special technical features” so as to provide the set of claims with unity of invention.

Analysis of Divisional Applications

3.133 For the purposes of Article 26 of the Brazilian Patent Statute, the “original application” is considered as the first filed application. The application may be divided, throughout the substantive examination, at the request of the applicant. This time limit does not apply to the division of applications suggested by the BRPTO (*Sua sponte*). Further divisional applications that have already been divided will not be accepted.

3.134 Issues related to the analysis of claims with regard to the patentability requirements, to non-compliance with Article 32 of the Brazilian Patent Statute by extending beyond the scope claimed in the original application, and to double patenting are issues that must be explored in the substantive examination, *i.e.*, after the notice regarding the divisional application is published in the BRPTO's Official Gazette under publication code 2.4.

3.135 Furthermore, during the substantive examination of a divisional application notified under publication code 2.4 published in BRPTO's Official Gazette, the Examiner must analyze Item II of Article 26 of the Brazilian Patent Statute, verifying whether the subject matter of the divisional application exceeds the one disclosed in the original application. The examination will continue once this criterion is complied with. Otherwise, the divisional application will be dismissed, published under publication code 11.12 in the BRPTO's Official Gazette, indicating the reasons for its rejection. Should the subject matter of the application exceed the subject matter disclosed in the original application, the Examiner must indicate one or more segments in which added matter was noted.

3.136 ~~As provided for in the Normative Instruction in force, “The patent application may be divided into two or more applications up to the end of the examination:~~

- a) ~~at the request of the applicant, even when the application has a group of inventions that are interrelated through the same inventive concept;~~
- b) ~~pursuant to the non final office action, when the technical examination shows that the application has a group of inventions comprising more than one inventive concept or more than one utility model.” (revoked by Ordinance #14/2024; see Item 3.133 above)~~

3.137 Should a divisional application be generated from a subject matter which has already undergone examination and was found to lack the merit needed for patentability, said patent application should be rejected, maintaining the same objections that were initially raised regarding said merit.

Unity of Invention and Double Patenting

3.138 The procedure for dividing a patent application must consist in removing part of the subject matter claimed in the original application so as to constitute the divisional application(s). Merely replicating part of the subject matter claimed in the original patent application, in order to constitute a divisional application, results in a multiplication of the patent application, rather than a division.

3.139 During the substantive examination of the divisional application, should there be any extension of the claimed scope when compared to the original application, the Examiner must issue a non-final office action based on Article 32 of the Brazilian Patent Statute, as changes to the set of claims are restricted until the original application is examined.

3.140 Divisional applications cannot imply double patenting of the invention or utility model. Article 6 of the Brazilian Patent Statute provides that the author of an invention or utility model will be assured the right to obtain the patent granting ownership thereof. For the purposes of better understanding this article, two patents cannot be granted for the same invention or utility model.

3.141 The existence of double patenting in a divisional application must be analyzed by comparing its set

of claims with the set in the original application, as well as with the set of claims in the other divisional applications, if any. In this case, the divisional application must be rejected for failing to comply with the provisions of Article 6 of the Brazilian Patent Statute.

3.142 Should a divisional application address a subject matter that is more specific than that covered by the original application from which it derives, the technical examination of this divisional application must be rejected for failure to comply with the provisions of Article 6 of the Brazilian Patent Statute, as this implies double patenting, given that the broader subject matter claimed in the original application already encompasses the more detailed subject matter claimed in the divisional application.

3.143 A claim considered as constituting an alternative implementation of the invention and included in the set of claims presented in the original application may be withdrawn from the original application and claimed in a divisional application, at the option of the Applicant, even if such claim falls within the inventive concept claimed in the original application. Note also the limitations described in Item 3.133.

Chapter IV - DRAWINGS

4.01 Should drawings be submitted, they must be listed in the specification, by specifying their graphic representations, such as: views, cross-sections, perspectives, and electric circuit diagrams. When the specification mentions an element in the drawing(s), such element must be accompanied by its reference sign, such as: "the hose (4) is connected to the valve (10)."

4.02 Note that the terminology and symbols must be uniform throughout the application.

4.03 Should the quality of submitted drawings be not good enough for proper visualization, the Examiner must issue an office action, as per Article 24 of the Brazilian Patent Statute and with attention to Article 32 of the Brazilian Patent Statute.

4.04 The drawings must preferably comply with the provisions of the Brazilian standards for technical drawings. In this sense, the Examiner may issue an office action, *e.g.*, if drawings are hand-drawn.

4.05 Graphic representations, such as figures, photographs, flowcharts or graphs, will be accepted only in cases when such reproductions are clear.

4.06 When the quality of submitted photographs is not good enough for proper visualization, the Examiner cannot issue an office action for the submission of better-quality photographs, due to the risk of adding subject matter. The initially presented subject matter initially submitted must be accepted for examination.

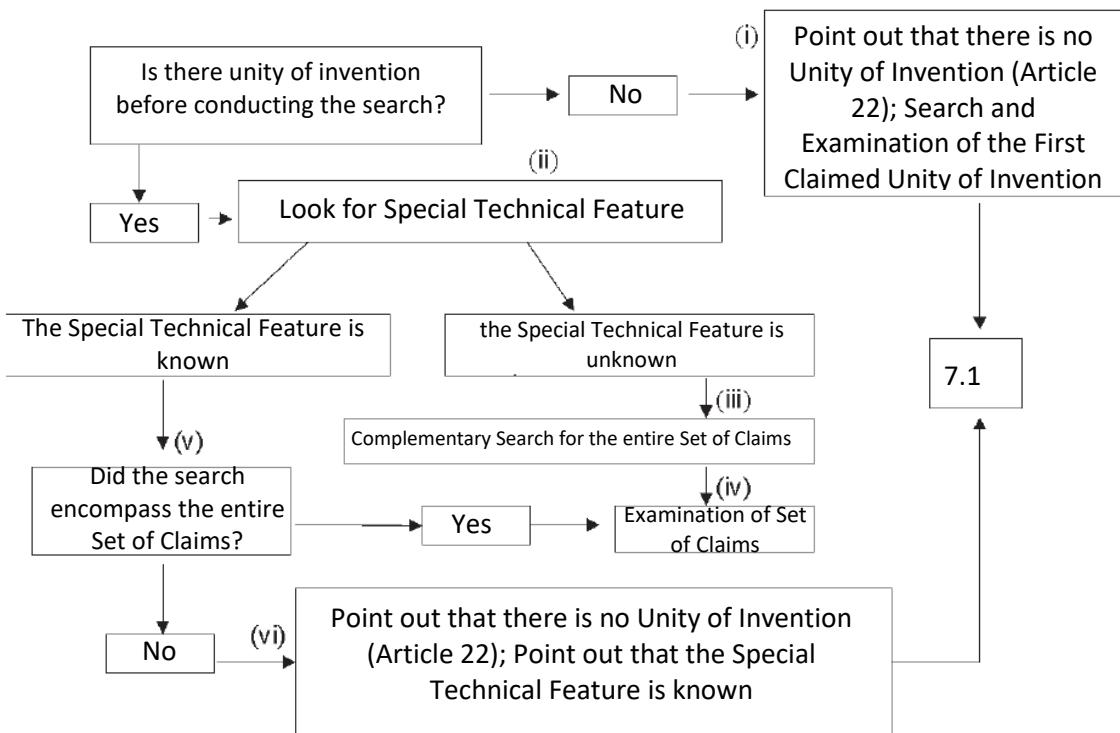
Chapter V - ABSTRACT

5.01 As many databases are used, consulting only abstracts and titles, the abstract must contain key words to make searches easier. This is due to the need of correct dissemination of the technology encompassed by the invention to society as a whole.

5.02 Furthermore, considering that users read abstracts in order to decide whether to read the document in full, this must provide a concise description with an indication of the technical field of the invention, a technical explanation of the invention as such, and possibly also its main field of application.

APPENDIX

Appendix I - Processing Flowchart for Unity of Invention Analysis



Appendix II - Change History

Item	Original text (Rule #124/2013)	Amended text (Current Ordinance)	Compared text
2.01	deleted: "-relates to a single invention or to a group of inventions that are interrelated to each other in such a way that they constitute a single overall inventive concept;"		2.01 The examiner must ascertain whether the manner of presentation of the Specification meets the following requirements: -starts with the title; -relates to a single invention or to a group of inventions that are interrelated to each other in such a way that they constitute a single overall inventive concept;
2.07	from: "Normative Instruction"	to: "Ordinance"	2.07 In accordance with the Normative Instruction <ins>Ordinance</ins> in force
2.36	from: "Chemical formulae and/or mathematical equations"	to: "Chemical formulae and/or mathematical expressions"	2.36 Chemical formulae and/or mathematical <ins>expressions</ins>
chap.III	from: "SET OF CLAIMS"	to: "SET OF CLAIMS"	Chapter III SET OF CLAIMS
3.12	from: "Normative Instruction"	to: "Ordinance"	3.12 In accordance with the Normative Instruction <ins>Ordinance</ins> in force
3.15	from: "may contain chemical or mathematical formulae"	to: "may contain chemical formulae or mathematical expressions"	3.15 The claims, as well as the specification, may contain chemical formulae or mathematical <ins>expressions</ins>
3.20	from: "(a) preferably begin with the title of the application and must contain a single expression "characterized in that";"	to: "(a) begin with its category and must contain a single expression "characterized in that";"	The drafting of claims must: (a) preferably begin with the title of the application <ins>its category</ins> and must contain a single expression "characterized in that";"
3.27	from: Independent claims must contain a preamble, between their initial part and the expression "characterized in that"	to: Independent claims must contain, before the expression "characterized in that", a preamble	3.27 Independent claims must contain, between their initial part and before the expression "characterized in that", a preamble
3.81	from: "The use of parenthesis in chemical or mathematical formulae is also acceptable."	to: "The use of parenthesis in chemical or mathematical expressions is also acceptable."	3.81 (...) The use of parentheses in chemical or mathematical <ins>formulae expressions</ins> is also acceptable.
3.133	from: "For the purposes of Article 26 of the Brazilian Patent Statute, the "original application" is considered as the first filed application, which may be divided only throughout the substantive examination. Further divisional applications that have already been divided will not be accepted."	to: "For the purposes of Article 26 of the Brazilian Patent Statute, the "original application" is considered as the first filed application. The application may be divided, throughout the substantive examination, at the request of the applicant. This time limit does not apply to the division of applications suggested by the BRPTO (<i>sua sponte</i>). Further divisional applications that have already been divided will not be accepted."	3.133 For the purposes of Article 26 of the Brazilian Patent Statute, the "original application" is considered as the first filed application, which <ins>The application</ins> may be divided, only throughout the substantive examination <ins>at the request of the applicant</ins> . This time limit does not apply to the division of applications suggested by the BRPTO (<i>sua sponte</i>) . Further divisional applications that have already been divided will not be accepted.
3,136	deleted in full		3.136 As contemplated in the current Normative Instruction, "The patent application may be divided into two or more until the end of the examination: <i>a) at the request of the applicant, even when the application represents a group of inventions that are interrelated by the same inventive concept;</i> <i>b) Pursuant to the non final office action, when the technical examination shows that the application contains a group of inventions that comprise more than one inventive concept or more than one utility model".</i> (repealed by Ordinance #14/2024; see Item 3.133 above)
3,139	from: "based on Article 32 of the Brazilian Patent Statute, a changes to"	to: "based on Article 32 of the Brazilian Patent Statute, as changes to"	3.139 During the substantive examination of the divisional application, should there be any extension of the claimed scope when compared to the original application, the Examiner must issue an non-final office action based on Article 32 of the Brazilian Patent Statute, as changes to
3,140	from: "The Normative Instruction in force provides that divisional applications"	to: "Divisional applications"	3.140 The Normative Instruction in force provides that Divisional applications cannot imply double patenting

3,143	from: "and claimed in a divisional application, at the option of the Applicant, even if such claim falls within the inventive concept claimed in the original application."	to: "and claimed in a divisional application, at the option of the Applicant, even if such claim falls within the inventive concept claimed in the original application." Note also the limitations described in Item 3.133."	3.143 A claim considered as constituting an alternative implementation of the invention and included in the set of claims presented in the original application may be withdrawn from the original application and claimed in a divisional application, at the option of the Applicant, even if such claim falls within the inventive concept claimed in the original application. <u>Note also the limitations described in Item 3.133.</u>
4.05	from: "Submitting reproductions of photographs such as metalographic structures or software-generated tridimensional images will be accepted only in cases when such reproductions are clear and allow for a better understanding of the invention."	to: "Graphic representations, such as figures, photographs, flowcharts or graphs, will be accepted only in cases when such reproductions are clear."	4.05 Submitting reproductions of Graphic representations, such as figures, photographs, flowcharts or graphs, such as metalographic structures or software-generated tridimensional images will be accepted only in cases when such reproductions are clear and allow for a better understanding of the invention.
4.06	from: "Color photographs are accepted only when this is the only possible way of graphically representing the object subject matter of the application. Should the quality of submitted photographs"	to: "When the quality of submitted photographs"	4.06 Color photographs are accepted only when this is the only possible way of graphically representing the object subject matter of the application. Should 4.06 <u>When</u> the quality of submitted photographs



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