

Patent Claim Format and Independent Claims

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Patent Claim Format

A patent claim has the following three parts:

- preamble
- transitional phrase
- body

A claim is written as a single sentence.

1. An apparatus, comprising:
part A; and
part B coupled with part A.

Patent Claim Format

Sample Claim:

Claim #

1.

An apparatus for cooking rice,

comprising:

at least one container for holding rice and water; and

a heat source configured to transfer heat into the container.

preamble

body

transition

Patent Claim Format

Preamble:

- Defines a category for the invention
 1. **A semiconductor device**, comprising:
 - a substrate; and
 - electrically conductive pathways on the substrate.
- Often identifies the type of invention
 - Ex.: **A method for ...**
- Usually consistent with title of patent application

Patent Claim Format

Example:

Title of patent application:

“Rice Cooking Apparatus”

Claim preamble might read:

1. An apparatus for cooking rice, ...

Patent Claim Format

Example: But suppose that the inventor knows that the apparatus could be used for cooking any type of grain, then a broader preamble might read:

1. An apparatus for cooking grains, ...

Patent Claim Format

Example: Now suppose that the inventor knows that the apparatus could be used for cooking vegetables and melting cheese, then a broader preamble might read:

1. An apparatus for cooking, ...

Patent Claim Format

In drafting claims and their preambles, it is important to know:

- what the invention is,
- how adaptable the invention is to related technologies, and
- how the client plans to make money from the invention.

Patent Claim Format

Transition:

- Follows the preamble
- May be preceded with a comma and followed with a colon
- Open or closed (next slide)
 1. An apparatus, **comprising**:
part A; and
part B coupled with part A.

Patent Claim Format

With **open** transitions:

- recited elements specify the **minimum** that is needed for infringement;
- the presence of **other** elements in an infringing device **does not defeat** infringement claim.

With **closed** transitions:

- recited elements specify the **full scope** of what is required for infringement;
- the presence of **other** elements in an otherwise infringing device **defeats** infringement claim.

Patent Claim Format

Open Transitions: “Comprising” and “Including”:

- have been construed to mean “including the following elements but not excluding others” in most jurisdictions;
- typically interpreted as being open-ended (allowing inclusion of other elements/steps);
- however, be wary of differences across countries:
 - a few jurisdictions have found “comprising” to be a closed phrase.

Patent Claim Format

Example:

Invention relates to a pencil with an eraser and a light attached to it ...

Claim might be:

1. *A lighted pencil, comprising:*

an elongated pencil shaft having two ends and a central region;

an eraser attached to one of the ends of the elongated pencil shaft; and

a light attached to the center region of the pencil shaft.

Patent Claim Format

Closed Transitions: “Consisting of”

- has been construed to mean that the claim covers **only** the elements named with nothing more;
 - the body of the claim specifies “100%” of everything protected;
- confers a close-ended connotation.

Patent Claim Format

Use closed-ended phrases **sparingly**:

- your client will usually not want to limit the claim to just the recited elements;
- imagine how easily a competitor could make a trivial addition and avoid infringement;
- may alternatively use “**consisting essentially of**” transition for less-restrictive confinement.
 - In chemistry, use of “consisting essentially of” may still cover embodiments that also include inert or other non-active components.

Patent Claim Format

Body:

- follows the transitional phrase;
- recites the **limitations** of the claim;
- explains the **relationship** between the different limitations.

1. An apparatus, comprising:
part A; and
part B coupled with part A.

Patent Claim Format

The following apparatus claim directed to a table would likely be rejected:

1. *An apparatus for holding items, comprising:
a top; and
at least one leg.*

Why?

No **relationship** is provided between (or among) the recited elements—the above body is merely a “**list of parts**”.

Patent Claim Format

A better claim might read:

1. *An apparatus for holding items, comprising:
a top; and
at least one leg **coupled with the top to support the top in an elevated position.***

The above-highlighted language explains how the leg is configured in relation to the table top.

Patent Claim Format

Claim *punctuation*:

- a **comma** appears at the beginning of the transitional phrase;
- a **colon** appears at the end of the transitional phrase;
- a **semi-colon** appears between each subpart;
- the claim ends with a **period**.

Example: 1. An apparatus, comprising:
part A;
part B; and
part C coupled with parts A and B.

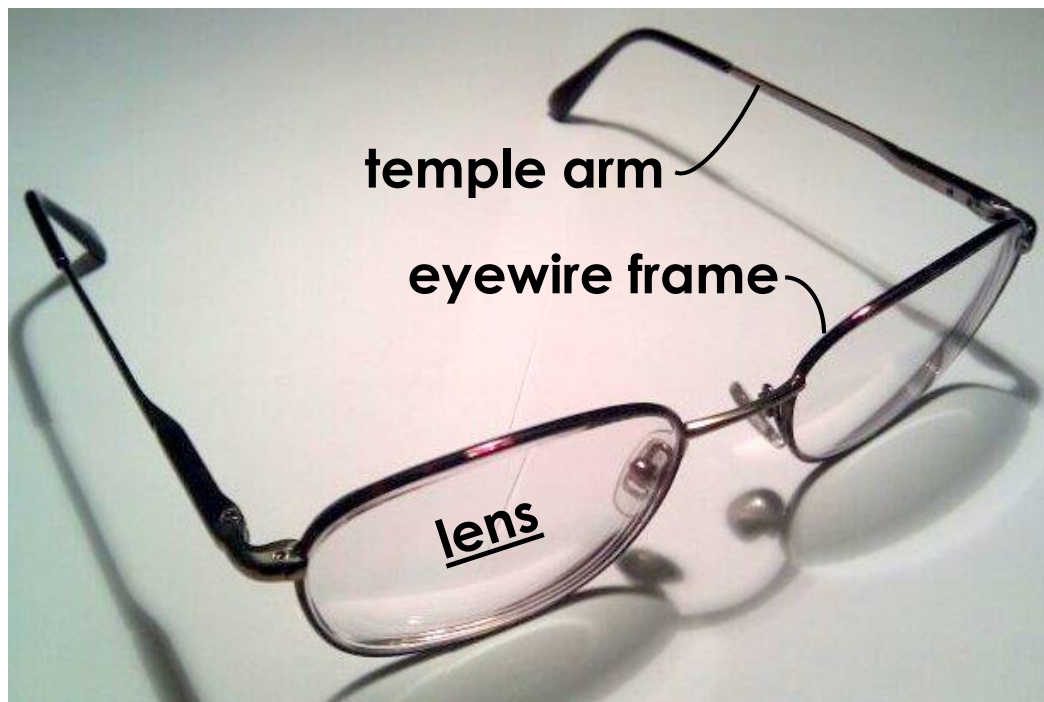
Patent Claim Format

Provide proper ***antecedent basis***:

- Introduce a new element by initially referring to it with an ***indefinite*** article (“a” or “an”)
 - “a cap”
- In subsequent references (within the same claim set) to that same element, use a ***definite*** article (“the” or “said”)
 - “the cap” or “said cap”

Patent Claim Format

Example invention for illustrating antecedent basis -- Eyeglasses



Patent Claim Format

Antecedent Example (Apparatus):

1. Eyeglasses, comprising:

a pair of lenses;

an eyewire frame containing **the** lenses; and

a pair of temple arms extending from **the** eyewire frame.



Patent Claim Format

Antecedent Example (Method):

1. A method for assembling eyeglasses, comprising:
 - inserting **a** pair of lenses into **an** eyewire frame; and
 - pivotably mounting **a** pair of temple arms to **the** eyewire frame.



Patent Claim Format

Distinguishing similar parts in a claim:

- If the claim recites two or more identically named parts, then the claim must distinguish between the two parts.
- For example,
 - use “**first**” and “**second**”
 - “a first widget attached to a first end and a second widget attached to a second end”
 - if, for example, you have two identical valves in a system, you might refer to an “**input** valve” and an “**output** valve”.

Patent Claim Format

Example:

1. A device, comprising:
 - a **first** part;
 - a **second** part attached to the **first** part; and
 - a **third** part fastened to the **second** part.

Patent Claim Format

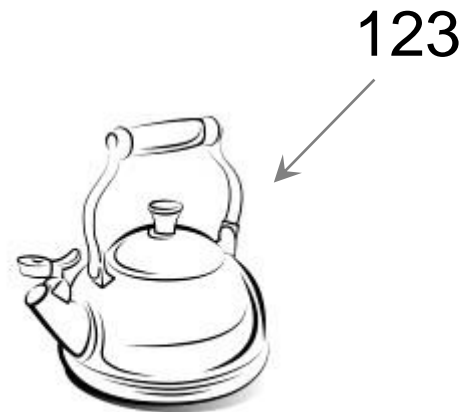
Reference Numerals:

- In some jurisdictions (e.g., EPO), claims may need reference numerals that match corresponding elements in the drawings and specification of the patent application.

Patent Claim Format

Reference Numerals:

- Assume Figure 1 of the application shows a teapot, which is labeled “123.”
- If the claims recite this particular teapot, then the teapot element may need to be followed by the reference number “123”
 1. A method for making tea, comprising:
filling a teapot (123) with water . . .



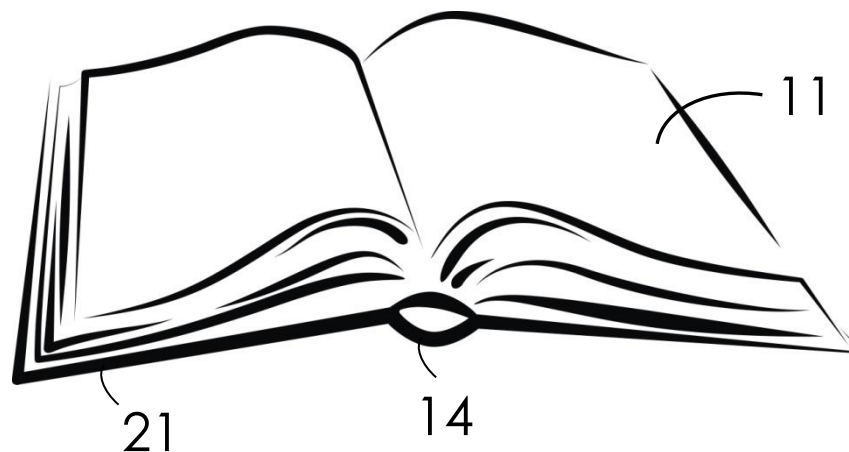
Patent Claim Format

Reference Numerals:

1. A book, comprising:
 - a plurality of printed pages (11);
 - a binding (14) configured to moveably attach the printed pages (11); and
 - a cover (21) attached to the binding (14).

Drawing:

FIG. 1



Patent Claim Format

Words/phrases may be used to further define or characterize a structure or to provide a function associated with a given structure:

- “wherein,” “such that,” and “so as to”
- used to describe function, operation, or result that flows from the recited structure;
- Ex.: “An apparatus, comprising . . . a folder for keeping files, **wherein** the folder is configured to receive and contain the files . . .”
- Important to know how these terms/phrases are interpreted in your jurisdiction

Patent Claim Format

Claims usually include **multiple** components or steps

- A claim usually recites at least two elements.
- *But see the first claim of US Patent 3,156,523 (“1. Element 95.”).*

Group→	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
↓Period																		
1	1 H																	2 He
2	3 Li	4 Be											5 B	6 C	7 N	8 O	9 F	10 Ne
3	11 Na	12 Mg											13 Al	14 Si	15 P	16 S	17 Cl	18 Ar
4	19 K	20 Ca	21 Sc	22 Ti	23 V	24 Cr	25 Mn	26 Fe	27 Co	28 Ni	29 Cu	30 Zn	31 Ga	32 Ge	33 As	34 Se	35 Br	36 Kr
5	37 Rb	38 Sr	39 Y	40 Zr	41 Nb	42 Mo	43 Tc	44 Ru	45 Rh	46 Pd	47 Ag	48 Cd	49 In	50 Sn	51 Sb	52 Te	53 I	54 Xe
6	55 Cs	56 Ba	*	72 Hf	73 Ta	74 W	75 Re	76 Os	77 Ir	78 Pt	79 Au	80 Hg	81 Tl	82 Pb	83 Bi	84 Po	85 At	86 Rn
7	87 Fr	88 Ra	**	104 Rf	105 Db	106 Sg	107 Bh	108 Hs	109 Mt	110 Ds	111 Rg	112 Cn	113 Uut	114 Fl	115 Uup	116 Lv	117 Uus	118 Uuo
			*	57 La	58 Ce	59 Pr	60 Nd	61 Pm	62 Sm	63 Eu	64 Gd	65 Tb	66 Dy	67 Ho	68 Er	69 Tm	70 Yb	71 Lu
			**	89 Ac	90 Th	91 Pa	92 U	93 Np	94 Pu	95 Am	96 Cm	97 Bk	98 Cf	99 Es	100 Fm	101 Md	102 No	103 Lr

Patent Claim Format

A patent claim without many components/steps or other limitations may be overly broad.

Compare:

- “a coat” with
- “a coat having five pockets, six buttons, and a silk lining”

Patent Claim Format

Alternatives:

- A claim may refer to various alternatives
 - provided that the alternatives are supported in the specification, and
 - if the claim's scope is not obscured.
- Such alternatives are sometimes known as “Markush groups”.
- Can be used in all practice areas; most commonly found in chemical practice.

Patent Claim Format

Ex.: A step in a process requires addition of “copper,” “lead,” or “gold.”

- These are the only “metals” that can be used.

Claim language encompassing all three metals could read:

- “adding a metal selected from the group consisting of copper, lead, and gold” (classic “Markush” format) or
- “adding at least one metal selected from copper, lead, and gold”

Patent Claim Format

Markush Groupings:

- Before using such a grouping, the patent agent should verify that there is not a more elegant (or precise) way of phrasing the claim.
- A more precise phrasing may provide the maximum scope of protection.

For example, if “copper,” “lead,” “gold” belong to a class that includes other metals (among the ***transition elements***) that would also work, then the patent agent may better serve his client’s interests by reciting the class name:

- “. . . adding ***a transition metal*** . . .”

Questions?