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DECISION of 26 April 1999

Case Number: T 0677/97 - 3.5.2

Application Number: 92830335.3

Publication Number: 0585505

IPC: H03K 19/00

Language of the proceedings: EN

Title of invention:

Low noise buffer

Applicant:

STMicroelectronics S.r.l.

Opponent:

Headword:

Relevant legal provisions:

EPC Art. 56, 96(2), 109(1), 111(1), 113(1) EPC R. 51(2), (3), 67

Keyword:

- "Precipitate refusal after inadequately reasoned single communication - applicant not afforded an opportunity to comment on the reasons for refusal - substantial procedural violation"
- "Appeal against precipitate refusal well founded failure to grant interlocutory revision - substantial procedural violation"

Decisions cited:

T 0098/88, T 0951/92

Catchword:

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Boards of Appeal

Chambres de recours

Case Number: T 0677/97 - 3.5.2

DECISION
of the Technical Board of Appeal 3.5.2
of 26 April 1999

Appellant: STMicroelectronics S.r.l.

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Representative: Pellegri, Alberto

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Decision under appeal: Decision of the Examining Division of the

European Patent Office posted 23 January 1997

refusing European patent application

No. 92 830 335.3 pursuant to Article 97(1) EPC.

Composition of the Board:

Chairman: W. J. L. Wheeler Members: R. G. O'Connell

J. H. P. Willems

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Summary of Facts and Submissions

This is an appeal from the refusal by the examining division of European patent application No. 92 830 335.3. The reason given for the refusal was that the subject-matter of claim 1 did not involve an inventive step having regard to the following prior art document:

D1: US-A-5 057 711.

II. In a first communication issued pursuant to Article 96(2) and Rule 51(2) EPC, the examining division listed four prior art documents D1 to D4, all of which had been categorised as 'A' (technological background) in the European search report, and continued in the following terms:

"The method defined in Claim (sic) appears to be essentially similar to that known from each of D1, D2, D3 and D4. Attention is drawn in particular to Figure 8 of D1 in which a succession of 2 precharge phases (peak 8 mA), to bring the output node to an intermediate value, followed by a third switching phase (peak 14 mA) are indicated. Whilst the equality of time derivatives claimed cannot be elucidated from D1, this stipulation is considered to correspond to an obvious idealization (or even simplification) of the teaching of D1. Claim 1 is accordingly found to lack an inventive step in the sense of Article 56 EPC and is hence unallowable under Article 52(1) EPC.

The detailed arrangement defined in independent apparatus Claim 6 would not appear to be routinely

derivable from the prior art, and this Claim is hence in principle allowable. For further proceedings the applicant is accordingly invited to file just new method Claims, together with a reasoned statement explaining why the claimed method may be considered to represent a non-obvious development or departure from the teaching of the prior art cited.

D1, D2, D3 and D4 all represent relevant prior art in the sense of Rule 27(1)(b) EPC and should hence be duly acknowledged in the description. D1 in particular would provide a suitable basis for the preamble portion of a two-part Claim [Rule 29(1) EPC]."

- III. The applicant (now appellant) responded by filing a clarified claim 1 delimited with respect to D1 and by traversing the obviousness objection, pointing out that claim 1 was to be interpreted as specifying a positive control of the time derivative of the current a feature which was not taught in D1. The examining division did not issue a second communication or otherwise contact the applicant before issuing the refusal decision, the subject of this appeal.
- IV. On appeal the appellant amended claim 1 to clarify further the characterising feature of "controlling said precharging current to maintain a constant time derivative". This claim, which in view of the order below is the only claim which needs to be considered in this appeal, is now worded as follows:
 - "1. A method for reducing the switching noise caused by a buffer circuit capable of generating a current for bringing to a pre-established voltage an output node in

function of a certain logic signal applied to an input node of the buffer, which comprises precharging said output node to an intermediate voltage between a pre-existent voltage of said output node and a different pre-established voltage before bringing the output node to said different preestablished voltage, characterized by

controlling said precharging current to maintain a constant time derivative of a first sign of the current, during a first time interval of precharge and a constant current time derivative of opposite sign of the current during a second time interval of precharge;

controlling the current bringing the output voltage to said different pre-established voltage to maintain a constant time derivative during a successive third time interval."

V. The appellant's arguments can be summarised as follows:

V.1 Procedural aspects

The immediate decision to refuse represented uncustomary and unjustified haste. The appellant's 'failure' to cancel all method claims, while submitting an articulated statement of the reasons for arguing what appeared to be a misunderstanding of the technical gist of the invention by the examiner in his first communication, could not be equated to not making "any real effort to deal with the objections" which is the characterisation in the Guidelines for examination at the EPO (C-VI, 4.3) of the exceptional situation in which an application should be refused without warning

after a first communication. As a consequence of this precipitate refusal the appellant had been obliged to appeal without having been given an opportunity to consider the reasons why the examiner did not consider appellant's arguments sufficient to overcome his original objection and to knowingly respond to precise contentions.

V.2 Inventive step

The phrase "a simplified idealization of the teaching of D1" used in the decision under appeal was obscure. The contention that the constancy of the time derivatives of the precharge current and of the subsequent current that actuates the change of state of the node was derivable in this way from D1 was a clear manifestation of hindsight.

The objective of D1 was to reduce the peak level of the current involved in a transition between output node states. The present invention, based on the insight that the D1 method still involved noise-generating abrupt changes of current, was an improvement on D1 and proposed instead a positively exerted control of the time derivative of the charging and discharging current so as to maintain it constant in well-defined intervals of time, thus smoothing discontinuities in the current profile associated with a node transition. The examining division had not indicated which part of the teaching of D1 would induce a person skilled in the art to devise and implement such a control.

The implications drawn in paragraph 9 of the decision under appeal remained totally obscure. It was not

understood why the examining division reckoned the charging in D1 to be a process "under control of the time derivative" since D1 did not implement means for exerting a positive control to keep the time derivative constant. The diagrams of Figure 8 of D1 clearly showed that the current underwent abrupt changes that would correspond to large (peaking) values of the time derivative of current. If the argument of the examining division was that the D1 process obeyed some intrinsic time constant parameters, this would not amount to implementing a positive control of the absolute value of the time derivative to a constant value of the kind implemented in the present application by the activated one of the two blocks designated TD and PU in Figure 2. The operation of these blocks was described in detail at page 30 of the description, which implementation had not been commented on in the sole communication sent pursuant to Article 96(2) and Rule 51(2) EPC.

Hence the conclusion contained in the said paragraph 9 of the decision under appeal that the subject-matter of claim 1 did not involve an inventive step was unfounded.

VI. The appellant requests that the decision under appeal be set aside and that the application be processed to grant. In addition the appellant requests reimbursement of the appeal fee.

Reasons for the Decision

1. The appeal is admissible.

- 2. Examination procedure (Articles 96(2), 113(1) EPC)
- 2.1 In the judgement of the board the pre-decision examination procedure did not meet the minimum legal standard set by the EPC in Article 96(2) and Rules 51(2) and (3). The single communication contained a single relevant sentence purporting to show that claim 1 was obvious in view of D1: "Attention is drawn in particular to Figure 8 of D1 in which a succession of 2 precharge phases (peak 8 mA), to bring the output node to an intermediate value, followed by a third switching phase (peak 14 mA) are indicated". (The next sentence refers to "equality of time derivatives" which is a feature of claim 4 but not of claim 1).
- 2.2 Rule 51(3), by virtue of the phrase "where appropriate" allows the examining division discretion to issue a first communication which is less than comprehensive and the Guidelines for examination at the EPO at C-VI, 3.6 indicate some situations where this may be appropriate. This interpretation of the EPC by the guidelines was approved in decision T 98/88 dated 15 January 1990 (not published in OJ EPO) at reasons 6.1. Hence the fact that the examining division's first communication did not, in the judgement of the board, comprise a reasoned statement in support of the objection of obviousness did not of itself constitute a procedural violation. However, following a constructive response from the applicant which traversed the obviousness objection, pointing out that claim 1 was to be interpreted as specifying a positive control of the time derivative - a feature which was not taught in D1 -, it was incumbent on the examining division under Article 96(2) to send a second

communication containing a reasoned statement as to why the objection under Article 56 EPC was maintained. In making this finding the board is not departing from the established jurisprudence of the EPO Boards of Appeal which recognises that it is within the discretion of an examining division to issue a refusal decision after a single communication. In the circumstances of the present case however, as outlined above, it ought to have been clear to the examining division that an immediate refusal - limiting the sum total of relevant reasoning in an examination procedure leading to a refusal for lack of inventive step of claim 1 to the single sentence cited in paragraph 2.1 above - was not a reasonable exercise of this discretion. The limits on the examining division's discretion in this respect were explained in decision T 951/92 OJ EPO 1996, 53, the headnotes of which state:

- "I. In the context of the examining procedure under Articles 96 and 97 EPC, Article 113(1) EPC is intended to ensure that before a decision refusing an application for non-compliance with a requirement of the EPC is issued, the applicant has been clearly informed by the EPO of the essential legal and factual reasons on which the finding of non-compliance is based, so that he knows in advance of the decision both that the application may be refused and why it may be refused, and so that he may have a proper opportunity to comment upon such reasons and/or to propose amendments so as to avoid refusal of the application.
- II. If a communication under Rule 51(3) EPC and pursuant to Article 96(2) EPC does not set out the essential legal and factual reasoning which would lead

to a finding that a requirement of the EPC has not been met, then a decision based upon such a finding cannot be issued without contravening Article 113(1) EPC, unless and until a communication has been issued which does contain such essential reasoning. If a decision is issued in the absence of a communication containing such essential reasoning, Article 96(2) EPC is also contravened, since in order to avoid contravening Article 113(1) EPC it was "necessary" to issue a further communication (following decision T 640/91, OJ EPO 1994, 918)."

- 2.3 The precipitate refusal deprived the applicant of his right under Article 113(1) EPC to be afforded an opportunity to comment on the reasons for the examining division's objection since these reasons were not adequately articulated in an Article 96(2) communication. As has been emphasised repeatedly in the established jurisprudence of the EPO Boards of Appeal a substantial denial of this fundamental procedural right always constitutes a substantial procedural violation.
- 2.4 The appellant's complaint that he had been obliged to appeal without having been given an opportunity to consider the reasons why the examiner did not consider the appellant's arguments sufficient to overcome his original objection (cf. point V.1, last sentence) is well founded in view of the fact that the decision under appeal contains reasons essential to the decision which were not communicated to the applicant prior to the decision, as explained at points 2.5 and 2.6 immediately following.
- 2.5 At point 6 (top of page 3) of the decision under

appeal, D1, Figure 8 is said to show a "fourth time interval in which the current tails off from 14mA back to 0mA" and the next paragraph goes on to give reasons why this 'fourth interval', "whilst not expressed in the Claim is implicit sincefinite." This extends significantly beyond the reasoning of the Article 96(2), Rule 51(2) communication.

- 2.6 Point 7 of the decision under appeal refers to "The constancy of the time derivatives stipulated in Claim 1", and states that the "applicant was however informed (c.f. paragraph 2 of the communication dated 09.04.96) that this stipulation is considered to correspond to a simplified idealization of the teaching of D1". In fact the passage in the communication referred to relates to "equality of time derivatives". Constancy and equality of the time derivatives are distinct features, the former being a feature of claim 1 and the latter of claim 4. Hence, objectively, the constancy of the time derivatives which is a key feature of claim 1 was addressed for the first time in the refusal decision itself.
- 2.7 In the judgement of the board, the appearance of these new reasons in the decision under appeal underlines the inadequacy of the reasoning in the communication in contravention of Articles 96(2) and 113(1) EPC involving a substantial procedural violation, as noted in paragraph 2.3 above.
 - 3. Interlocutory revision (Article 109 EPC)

Given that the applicant had correctly pointed out in the grounds of appeal that he had not been given an

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opportunity prior to issue of the refusal decision to comment on adequately articulated reasons underlying the inventive step objection, the appeal was manifestly well-founded within the meaning of Article 109(1) EPC and it was therefore, in the judgement of the board, incumbent on the examining division to set its decision aside and resume the truncated examination procedure. Hence the failure by the examining division to do so constituted a further substantial procedural violation and has led to unnecessary delay in completing the examination procedure.

4. Remittal (Article 111(1) EPC)

In order to restore the applicant's right to defend at two instances the present claim 1, which makes it abundantly clear that the current charging is positively controlled so as to have a constant time derivative - thus effectively precluding the claim interpretation on which the refusal was based -, the board deems it appropriate to set the decision under appeal aside and to remit the case to the examining division for further prosecution while refraining from comment on the substantive issues.

5. Reimbursement of the appeal fee (Rule 67 EPC)

Since the applicant was obliged to file this appeal to obtain the procedural right which he had been denied viz, the right to comment on the reasons for refusal, the board judges that reimbursement of the appeal fee is equitable.

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Order

For these reasons it is decided that:

- 1. The decision under appeal is set aside.
- 2. The case is remitted to the department of first instance for further prosecution.
- 3. The appeal fee shall be reimbursed.

The Registrar:

The Chairman:

M. Kiehl

W. J. L. Wheeler