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Datasheet for the decision
of 30 June 2016

Case Number:	T 1795/11 - 3.5.04
Application Number:	06019602.9
Publication Number:	1729515
IPC:	H04N5/775
Language of the proceedings:	EN

Title of invention:
Multimedia time warping system

Patent Proprietor:
TiVo, Inc.

Opponents:
Interessengemeinschaft für Rundfunkschutzrechte e.V.
Brunner/Williamson, John M. O./Claire Louise

Headword:

Relevant legal provisions:
EPC 1973 Art. 100(b), 100(c), 111(1)
EPC Art. 123(3)

Keyword:

Main request - patent granted on a divisional application - subject-matter extends beyond content of earlier application (yes)
First auxiliary request - amendments - broadening of claim (no)
First auxiliary request - sufficiency of disclosure (yes)
Remittal to the department of first instance (yes)

Decisions cited:

Catchword:

Beschwerdekammern

Boards of Appeal

Chambres de recours

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Case Number: **T 1795/11 - 3.5.04**

D E C I S I O N
of Technical Board of Appeal 3.5.04
of 30 June 2016

Appellant:	TiVo, Inc.
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Representative:	Pröll, Jürgen
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Respondent O2:	Brunner/Williamson, John M. O./Claire Louise
(Opponent 2)	43-45 Bloomsbury Square
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Representative:	Tunstall, Christopher Stephen
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Decision under appeal:	**Decision of the Opposition Division of the European Patent Office posted on 15 July 2011 revoking European patent No. 1729515 pursuant to Article 101(3)(b) EPC.**

Composition of the Board:

Chairman	C. Kunzelmann
Members:	R. Gerdes
	B. Müller

Summary of Facts and Submissions

I.   The appeal is against the decision of the opposition
        division revoking European patent No. 1 729 515, which
        was granted on a divisional application of the earlier
        application published as international application
        WO 00/07368 A1.

II.   The opposition was based on the grounds of lack of
        novelty and lack of inventive step (Articles 100(a) EPC
        in conjunction with Articles 54 and 56 EPC),
        insufficiency of disclosure (Article 100(b) EPC) and
        extended subject-matter (Article 100(c) EPC). The
        opposition division held that the subject-matter of the
        patent as granted (main request) extended beyond the
        content of the earlier application as filed, and that
        the subject-matter of the first and second auxiliary
        requests was insufficiently disclosed. It was
        additionally found that the claims of the second
        auxiliary request infringed Articles 84 and 123(3) EPC.

III.   The patent proprietor filed an appeal against this
        decision. It requested that the decision be set aside
        and that the case be remitted to the opposition
        division for further prosecution or, alternatively,
        that the decision be set aside and that the oppositions
        be rejected by the board. It also requested as an
        auxiliary measure that the patent be maintained in
        amended form on the basis of a number of different
        claim sets. The claims according to these different
        requests were:

        -   Main request: the claims of the patent as granted;
        -   Auxiliary requests Ia, Ib, IIa, IIb, IIc, IIIa,
            IIIb, IV, V, and VI: the corresponding claims filed
            with the statement of grounds of appeal.

-        Further options for combining the amendments of
         auxiliary requests Ia, Ib with those of auxiliary
         requests IIa, IIb, IIc, IIIa, IIIb, IV, V and VI
         were indicated in the statement of grounds of
         appeal.

IV.   In reply, respondent/joint opponents O2, henceforth
         respondent O2, requested that the appeal be dismissed
         and, alternatively, that the case be remitted to the
         opposition division for further prosecution. Respondent
         O2 also requested that the appellant's claim requests
         IIIa, IIIb, IV to VI not be admitted into the
         proceedings since they corresponded to claim requests
         withdrawn during the oral proceedings before the
         opposition division.
         Respondent/opponent O1 requested that the appeal be
         dismissed. It did not provide further reasons or
         arguments for its request.

V.   The appellant filed a further letter dated
         11 December 2014 enclosing claims of auxiliary
         requests 1 to 7. It indicated that it was prepared to
         withdraw the previous auxiliary requests if those of
         11 December 2014 were admitted into the proceedings.

VI.   In reply, respondent O2 requested that auxiliary
         requests 2 to 7 not be admitted into the proceedings.

VII.   The appellant filed a further letter dated
         23 April 2015. In this letter it submitted arguments as
         to why auxiliary requests 2 to 7 should be admitted
         into the proceedings. It also filed an expert opinion
         by Dr Thomas Schierl on the disclosure of the opposed
         patent.

VIII.   A number of further letters were then exchanged dealing
        with the procedural issue of admission of the auxiliary
        requests and of the expert opinion.

IX.   Respondent O2 replied with a letter dated 27 May 2016
        to a summons for oral proceedings which had been issued
        by the board. Respondent O2 submitted that the expert
        opinion was inappropriate evidence as to how the
        skilled person would interpret the patent, and filed an
        expert statement by Professor Touradj Ebrahimi as
        evidence for his interpretation of the patent.

X.   The patent proprietor replied with a letter dated
        30 May 2016 with arguments in favour of sufficiency of
        disclosure.

XI.   Oral proceedings were held on 30 June 2016. The
        respondent/opponent 1 (O1) was not represented at them.

        The appellant (patent proprietor) requested that the
        decision under appeal be set aside and that the patent
        be maintained on the basis of the main request with
        claims 1 and 2 of the patent as granted, or one of
        auxiliary requests 1 to 7, each with claims 1 and 2, as
        filed with the letter dated 11 December 2014.

        The respondents (joint opponents 2) requested that the
        appeal be dismissed.

XII.   Claim 1 of the main request reads as follows (features
        listed in the same way as in the decision under appeal,
        see point 7.1.1):

        "A process

(a) for the simultaneous storage and play back of
multimedia data, comprising the steps of:

(b) providing a physical data source, wherein said
physical data source accepts broadcast data from an
input device, parses video and audio data from said
broadcast data, and temporarily stores said video and
audio data;

(c) providing a source (1101), wherein said source
extracts video and audio data from said physical data
source;

(d) providing a transform process (1103), wherein said
transform process stores and retrieves MPEG streams
onto a storage device;

(e) wherein said source obtains a buffer from said
transform process said source converts video data into
MPEG streams and fills said buffer with said streams;

(f) wherein said source is automatically flow
controlled by said transform;

(g) providing a sink (1105), wherein said sink obtains
buffers containing MPEG streams from said transform
process and outputs said streams to a video and audio
decoder (1115);

(h) wherein said decoder converts said streams into TV
signals and sends said signals to a TV receiver;

(i) wherein said sink is automatically flow controlled
by said transform process;

(j) providing a control receiver (1114), wherein said control receiver receives commands from a user, said commands control flow of the broadcast data through the system; and

(k) wherein said control receiver sends flow command events to said source, transform process and sink."

XIII.   Claim 1 of the first auxiliary request reads as follows, amendments with respect to claim 1 of the main request being underlined, deletions marked by strikethrough:

"A process

(a) for the simultaneous storage and play back of multimedia data, comprising the steps of:

(b) providing a physical data source, wherein said physical data source accepts broadcast data from an input device, parses video and audio data from said broadcast data, and temporarily stores said video and audio data;

(c) providing a source object (1101), wherein said source object extracts video and audio data from said physical data source;

(d) providing a transform ~~process~~ object (1103), wherein said transform ~~process~~ object stores and retrieves MPEG streams onto a storage device;

(e) wherein said source object obtains a buffer from said transform ~~process~~ object, said source object converts video data into MPEG streams and fills said buffer with said streams;

(f) wherein said source object is automatically flow controlled by said transform object;

(g) providing a sink object (1105), wherein said sink object obtains buffers containing MPEG streams from said transform ~~process~~ object and outputs said streams to a video and audio decoder (1115);

(h) wherein said decoder converts said streams into TV signals and sends said signals to a TV receiver;

(i) wherein said sink object is automatically flow controlled by said transform ~~process~~ object;

(j) providing a control ~~receiver~~ object (1114), wherein said control ~~receiver~~ object receives commands from a user, said commands control flow of the broadcast data through the system; and

(k) wherein said control ~~receiver~~ object sends flow command events to said source, transform ~~process~~ and sink objects."

XIV.   The decision under appeal - as far as relevant for the present decision - may be summarised as follows:

The opposition division held that the terms source, sink and transform were used as such in the description of the earlier application as filed, but always and only in connection with the discussion of figure 8, i.e. the program logic within the CPU. The source, sink and transform were therefore conceptual software components. The discussion in the earlier application was limited to a software-based implementation of the claimed method, which limitation was absent from the

claims of the opposed patent, because of the removal of
the term "object" in the claims of the patent as
granted.

The opposition division also concurred with the
opponents that the term "control receiver" imparted the
notion of a physical device, which was not found in the
earlier application as filed. The term "unit" did not
give rise to any other interpretation than was already
present in the earlier application as filed.

Hence, the subject-matter of the opposed patent
extended beyond the earlier application as filed (see
point 8.1.4 of the decision).

The claims of the then first auxiliary request, which
essentially correspond to the present first auxiliary
request, overcame the objections under Article 100(c)
EPC, but the claimed subject-matter was not
sufficiently disclosed. The description did not allow
the skilled person to implement the functionality of a
source object. There was no need for any kind of
conversion into an MPEG stream in the source object,
since the source object already received MPEG video
streams from the media switch. With respect to the then
second auxiliary request, the division noted that the
source object merely took video data from a data
source, namely the media switch, and put it into a
buffer. The source object thus only passed on data, but
did not convert it (see points 9.3.4 and 10.4).

XV.   The appellant's arguments relevant for the present
        decision may be summarised as follows:

        With regard to the objection under Article 100(c) EPC,
        the contested terms had to be construed in the context

of the patent in suit. A skilled person would
consistently understand that these terms related to
software objects, see paragraphs [0038], [0039]
and [0053] of the opposed patent. It was also evident
from the context of these terms in claim 1 itself,
referring to flow control and parsing operations, that
the claimed entities were software objects. The term
"receiver" was a functional term. There was no
reasonable technical interpretation which implied that
the control receiver was implemented in hardware.

The claims of the first auxiliary request did not
extend the protection conferred by the patent as
granted. Changing "control receiver" to "control
object" implied a limitation of the scope of protection
from a functional definition to a software object. The
interpretation of the term "control receiver" as
relating to a hardware implementation excluded from the
scope of protection all software implementations and
consequently all embodiments in the description; that
did not make sense. The claims of the first auxiliary
request therefore did not infringe Article 123(3) EPC.

With respect to sufficiency of disclosure of the
subject-matter of the claims of the first auxiliary
request, the appellant argued that feature (e) had to
be understood as follows:

The expression "fills said buffer with said streams"
was to be interpreted to mean that logical segments
containing pointers to video and audio components in
the video and audio circular buffers were generated in
the PES buffer (see figure 6 together with
paragraphs [0043], [0044] and [0052] of the patent in
suit). When being transferred to the storage device a
PES buffer did not necessarily contain all video/audio

components themselves. A pointer to these components
was sufficient to reconstruct the stream (see
paragraph [0029]). In that case the audio/video
components could be gathered from different locations
using the pointers (feature (d)).

The expression "said source object converts video data
into MPEG streams" of feature (e) did not exclude the
video data being already provided to the source object
in an MPEG format. It was disclosed in the patent and
also in the earlier application as filed that data may
be provided to the apparatus as an MPEG transport
stream (see paragraphs [0017] and [0018] of the patent
in suit). The input section extracted a specific MPEG
program out of the MPEG2 transport multiplex and
supplied that program in an MPEG format to the media
switch. The media switch/physical data source parsed
the MPEG data and stored the data in separate audio and
video circular buffers (see figure 4: 410, 411 and
figure 6: 612, 613). It also filled the event buffer
(figure 6: 602) and notified the CPU/program logic of
these events being placed into the event buffer (see
paragraph [0025]). In a subsequent step the data filled
into the buffers were converted by the source object as
shown in figure 6. This conversion implied not only the
addition of a length field (compare figure 5: 501
showing an "event structure" and figure 6: 604 showing
a logical segment in the PES buffer) but also the
aggregation with the audio/video components from the
circular buffers such that the MPEG stream could be
stored on the storage device (see paragraph [0043]).
The conversion by the source object essentially
consisted in the generation of metadata relating to the
audio/video components. This generation and
reorganisation implied a format conversion.

XVI.   Respondent O2's arguments relevant for the present
        decision may be summarised as follows:

        With reference to paragraphs [0038], [0041], [0044],
        [0052] of the patent in suit and corresponding passages
        in the earlier application as filed, respondent O2
        argued that there was no basis in the earlier
        application for any other interpretation of the terms
        "source object", "sink object", "transform object" and
        "control object" than relating to software objects.

        The replacement of "control receiver" by "control
        object" in the independent claims of the first auxiliary
        request extended the protection conferred by the patent,
        contrary to Article 123(3) EPC. The term "control
        object" designated a software object, whereas a "control
        receiver" was a hardware entity. This was exemplified by
        the "TV receiver" and "digital satellite receiver"
        referenced in paragraphs [0017] and [0039] of the patent
        in suit, which were clearly hardware entities.
        Similarly, the change from a "transform process unit" to
        a "transform object" implied a change from a hardware
        entity to a software object.

        With reference to paragraphs [0017], [0018], [0028],
        [0031] and [0043] of the patent in suit, respondent O2
        argued that the patent did not disclose that the source
        object converted video data into MPEG streams
        (Article 100(b) EPC 1973). The patent only disclosed
        that the source object passed on MPEG streams that were
        received from a media switch. In particular, the input
        side of the media switch was connected to an MPEG
        encoder. According to paragraphs [0010], [0011]
        and [0036] together with figure 7, it was an object of
        the invention to decouple handling of MPEG streams from
        the CPU, where the source object resided. The patent did

not contemplate any form of conversion from one
(unspecified) MPEG format into another (unspecified)
MPEG format. The only disclosure in the patent was of a
data source (media switch and encoder) converting video
into MPEG streams (see letter of 7 February 2012,
points 19 to 30). The expression "converts into MPEG
streams" had to be interpreted as taking data, for
example pre-existing digital content or an analog video
signal, and generating a series (cf. "stream") of bits
which was in MPEG-compliant format. In essence, this
meant that the resulting bit stream itself could be
decoded by an MPEG-compliant decoder to produce the
decoded content as output. However, the logical segments
in the PES buffer could themselves not be decoded by an
MPEG-compliant decoder. There was also no disclosure of
how the MPEG streams were filled into the (PES) buffer
as required by claim 1 (see letter of 27 May 2016 and
attached expert opinion, points 8, 11 to 14 and 16).
Claim 1 required that the buffer was filled with the
streams, but according to the patent proprietor there
need not be audio/video data in the buffer. As a result
the claim was so broad that it could not be carried out
over its full scope. According to the patent in suit,
paragraph [0029], filling the (PES) buffer was a
transformation which required more than just creating
logical segments.

Reasons for the Decision

1.   The appeal is admissible.

Main request, added subject-matter

2.   The opposition underlying the present case was based
         inter alia on the ground that the subject-matter of the
         European patent extended beyond the content of the
         application as filed and of the earlier application as
         filed (Article 100(c) EPC 1973).

2.1   In the present case the divisional application
         EP 1 729 515 A1, for which the patent in suit was
         granted, was filed containing amended claims. The
         amendments essentially consisted in the omission of the
         word "object" from the terms "source object", "sink
         object" and "transform object" in claims 1 and 2, which
         were based on claims 13 and 26 of the earlier
         application as filed. In addition, the term "control
         object" was amended to read "control receiver".
         Furthermore, in the examination proceedings on the
         divisional application the term "transform" in claims 1
         and 2 was modified to read "transform process" and
         "transform process unit".

2.2   In the following the compliance of the claimed subject-
         matter of the opposed patent with the conditions laid
         down in Article 100(c) EPC 1973 will be evaluated.
         References to the description or drawings in this
         section relate to the earlier application as filed,
         which was published as WO 00/07368 A1.

2.3   The earlier application as filed relates to an
         apparatus and a process for the real-time capture,

storage and display of television broadcast signals for
time-shifting of the TV signals. The application aims
to provide a multimedia system giving the user the
ability to simultaneously record and play back TV
broadcast programs and to decouple a microprocessor/CPU
from the high video data rates. To achieve this goal an
architecture consisting of a media switch mediating
between a microprocessor/CPU, a hard disk or storage
device and memory is provided. The media switch
receives an MPEG stream as input signal and parses this
stream to separate it into audio and video components.
In addition, it looks for "MPEG distinguished events
indicating the start of video, audio or private data
segments" and generates event data structures that are
stored in an event buffer. The event data structures
contain offset, type and time stamp fields designating
the memory location, the type of data (audio, video or
private) and the time sequence information for the
component (see page 1, first paragraph; page 2, third
paragraph; page 5, last paragraph; page 6, third
paragraph; page 7, third paragraph; page 7, last
paragraph to page 8, first paragraph and figures 1
to 5).

The media switch notifies the program logic within the
CPU via an interrupt mechanism when events are placed
in the event buffer. The program logic generates a
sequence of logical segments from the events and places
the logical segments in a PES buffer. Buffer operations
are controlled by three conceptual components of the
program logic. A source object produces buffers of
data, for example it "takes data out of a physical data
source, such as the media switch" and "places it into a
PES buffer". A transform object processes buffers, for
example it "writes the buffer to a file" on the storage
medium, and sink objects consume the buffers, i.e. they

send them to the decoder. The buffers are passed from source object to transform object and then to sink object in a pipeline (see page 7, third paragraph; page 8, second to fourth paragraphs; page 11, second to fourth paragraphs; page 12, third paragraph and figures 6 to 8).

The control object "accepts commands from the user and sends events into the pipeline to control what the pipeline is doing" (see page 13, penultimate paragraph).

2.4   The board understands the cited passages to the effect that they directly and unambiguously disclose that the source objects, transform objects and sink objects as well as the control object are conceptual components of the program logic and, hence, part of the software provided on the CPU (see page 11, second paragraph). The board also agrees with respondent O2 that the term "object" must be interpreted as a software term that describes a collection of data or operations (see letter dated 7 February 2012, point 10 and 11). In contrast, the terms source, sink, control receiver and transform process (unit) - if not used in the context of implementation of the program logic - are not limited to this interpretation. These terms only imply functional limitations, but no limitation regarding their implementation.

Hence, the omission of the term "object" from the claims constituted a generalisation. The division of tasks between the microprocessor/CPU and the media switch is presented as a central goal of the invention, wherein the media switch has the task of discharging the microprocessor/CPU from having to handle the high video data rates (see page 2, third paragraph and

page 10, penultimate paragraph). This implies that - on the basis of the earlier application as filed - the skilled person would only have directly and unambiguously derived a software implementation of the source, transform, sink and control objects. Hence, the more general meaning of the terms source, sink and control object and transform process (unit) is not directly and unambiguously derivable from the earlier application as filed.

2.5   In the oral proceedings the appellant did not dispute that the skilled person would have understood the earlier application as filed to the effect that it only disclosed a software implementation of the source, transform, sink and control objects. However, the appellant argued that a skilled person would likewise interpret the claims of the patent as granted in the context of the description and the figures to the effect that the above terms related to software objects (see paragraphs [0038], [0039] and [0053] of the opposed patent). In addition, it was evident from the context of these terms in the claims themselves, referring to flow control and parsing operations, that the claimed entities were software objects.

The board follows the established case law according to which the appropriate procedure for deciding the issue here at hand is to properly interpret the claim and to consider whether, in that interpretation, it contains added subject-matter. Ambiguities should be removed taking into account the overall disclosure of the application as filed, in particular in view of the different embodiments the patent as granted was intended to cover (see Case Law of the Boards of Appeal of the European Patent Office, 7th edition, 2013, section II.E.2.1.1). In the present case the board sees

no ambiguities in the claims which are associated with
the deletion of the word "object" from the claims. The
claims unambiguously comprise generalisations of
described software features to functional features
which are not disclosed in their full generality in the
earlier application as filed. Furthermore, there is no
apparent reason why the skilled person would be
triggered by the wording of the claims to further
investigate the issue of whether the source, sink,
transform process (unit) and control receiver
designated software objects or more generally
functional units which could be implemented in software
or hardware.

The board also notes that the reference to flow control
and parsing operations does not imply a restriction of
the sink, source, transform process (unit) and control
receiver to software objects. As set out above (see
point 2.3), parsing is carried out by the media switch
which is supposed to decouple the microprocessor/CPU
from high video data rates. The parsing is, therefore,
not carried out by any of the components of the program
logic and thus not necessarily implemented in software.
Thus, the terms "parsing" and "flow control" are not
suitable to provide the context of a software
implementation.

2.6   It follows from the above that the main request is not
        allowable because the subject-matter of claims 1 and 2
        extends beyond the content of the earlier application
        as filed (Articles 76(1) and 100(c) EPC 1973).

*Auxiliary request 1 – added subject-matter/extension of
protection*

3.   Claims 1 and 2 according to auxiliary request 1 have
been amended to reintroduce the word "object" in the
terms "source object" and "sink object". The terms
"transform process" and "transform process unit" have
been amended to read "transform object". Furthermore,
the term "control receiver" has been amended to
"control object".

The board is satisfied that these amendments overcome
the ground for opposition under Article 100(c). The
amended claims correspond essentially to claims 13
and 26 of the earlier application as filed.

4.   Respondent O2 objected that the replacement of "control
receiver" by "control object" and the renaming of the
"transform process unit" as "transform object" in the
independent claims of the first auxiliary request
extended the protection conferred by the patent,
contrary to Article 123(3) EPC.

4.1   Feature (j) of claim 1 of auxiliary request 1 reads:
"providing a **control object** (1114), wherein said
control object **receives** commands from a user, said
commands control flow of the broadcast data through the
system" (emphasis added by the board). The
corresponding feature of claim 1 of the opposed patent
reads: "providing a **control receiver** (1114), wherein
said control receiver **receives** commands from a user,
said commands control flow of the broadcast data
through the system". Hence, both features specify an
entity receiving commands from a user. The designation
of the entity as a "receiver" is redundant in view of

the specification that it "receives commands from a user".

4.2   Respondent O2 argued that the term "receiver" implied a hardware implementation, as was evidenced by the similar terms "TV receiver" and "digital satellite receiver" referenced in paragraphs [0017] and [0039] of the patent in suit.

The board cannot subscribe to such a restrictive interpretation. The terms "TV receiver" and "digital satellite receiver" designate well-known electronic devices which are usually realised in hardware. However, "control receiver" is not a term the skilled person would consistently associate with a hardware device. Moreover, there is no definition of the term "receiver" in the patent in suit, for which reason the term must be given its broadest possible meaning. This meaning can only imply a functional limitation. For the same reasons, the board disagrees with the opposition division, which held in the decision under appeal that the expression "control receiver" imparted the notion of a physical device (see point 8.1.4 of the decision).

4.3   The replacement of the terms "transform process" and "transform process unit" by "transform object" in the independent claims of the first auxiliary request is also not considered to extend the protection conferred by the patent (Article 123(3) EPC). In the granted patent, both "transform process" and "transform process unit" imply only functional limitations and cannot be considered as being restricted to a hardware implementation.

4.4   Hence, the board concludes that the claims of auxiliary request 1 do not contain subject-matter extending

beyond the content of the earlier or divisional applications as filed and that they do not extend the protection conferred by the patent as granted.

Auxiliary request 1 – sufficiency of disclosure

5.   The objections under Article 100(b) EPC 1973 against the claimed subject-matter focused essentially on two lines of reasoning regarding feature (e), see expert opinion attached to the letter of 27 May 2016, points 8, 11 to 14 and 16:

(a) The patent did not disclose how the source object converted video data into MPEG streams. Actually, the patent only disclosed that the source object passed on MPEG streams that were received from a media switch. The format of the streams passed on by the source object could not be decoded by an MPEG-compliant decoder.

(b) There was no disclosure of how the MPEG streams were filled into the (PES) buffer as required by claim 1.

5.1   As set out under point 2.3 above, the event data structure shown in figure 5 of the patent in suit is generated by the media switch and stored in the event buffer (see figure 6: 602). The program logic of the microprocessor/CPU, in particular the source object, "translates" these events to logical segments 603 containing pointers to the audio and video segments 615 in the audio and video circular buffers. The logical segments are stored in a PES buffer 605. A comparison of the event data structures and the logical segments shows that this conversion is essentially limited to the addition of a length field 609 and the conversion

of the offset 502 into the actual address 610 of each
audio/video segment (see paragraphs [0025] to [0027]
and figures 5 and 6 of the patent in suit). The
appellant also referred to an aggregation or
association of logical segments 603 with the audio/
video segments 615 in the audio/video buffers (612,
613). However - apart from the conversion of the offset
into the actual address, see column 6, lines 52 and 53
of the patent in suit - the board cannot see any
indication in the patent of further steps to ensure
that all logical segments located in a PES buffer, as
well as all video/audio segments pointed to by these
logical segments, can be stored on the storage device.

In summary, the patent discloses that the source object
converts an event data structure to a logical segment
and stores the logical segment in a PES buffer.

5.2   The board agrees with respondent O2 that this
        conversion effected by the source object is at odds
        with the specification in feature (e) "said source
        object converts video data into MPEG streams". The
        respondent also argued correctly that the resulting
        stream is stricto sensu not an MPEG stream that could
        be decoded by a decoder compliant with an MPEG
        standard. Nevertheless, on the basis of the disclosure
        of the patent as a whole the skilled person would have
        been able to understand which conversion was carried
        out by the source object and what kind of data format
        was generated by that conversion. In the context of the
        patent as a whole the skilled person would also have
        understood that the data format for storage only
        related to an internal data format which did not have
        to be strictly MPEG compliant. In view of these
        considerations the board sees no difficulties in the

implementation of that data format or in the conversion
effected by the source object.

5.3   Similar considerations also apply to the second line of
       reasoning.

       It is correct that the patent in suit is silent as to
       how exactly the audio/video data of the MPEG streams
       are filled into the (PES) buffer. Actually, according
       to the description, paragraph [0029], "the data
       associated with logical segments need not be present in
       the buffer itself". The description further explains
       that the logical segments are written to the storage
       medium "in the logical order in which they appear. This
       has the effect of gathering components of the stream,
       whether they be in the video, audio or private data
       circular buffers, into a single linear buffer of stream
       data on the storage medium." The board agrees with the
       appellant that the skilled person would understand this
       passage to the effect that the video/audio data
       themselves did not need to be copied into the PES
       buffer, but that the pointers 610 were sufficient to
       reference the data in the circular buffers so that they
       could be transferred to the storage.

5.4   Taking this interpretation as a basis, respondent O2
       argued that the claim was so broad that it could not be
       carried out over its full scope. According to the
       patent in suit, paragraph [0029], filling the (PES)
       buffer was a transformation which required more than
       just creating logical segments.

       Again the board agrees that the wording of feature (e)
       of claim 1 is at odds with the description and the
       above interpretation. Nevertheless, according to the
       established jurisprudence of the boards of appeal,

sufficiency of disclosure must be assessed on the basis of the patent as a whole. The disclosure is aimed at the skilled person, who may use his common general knowledge to supplement the information contained in the patent (see Case Law of the Boards of Appeal of the European Patent Office, 7th edition, 2013, section II.C.2 and II.C.3).

In the present case, the board sees no particular difficulties which would hinder the skilled person from realising the filling of the PES buffers as set out above.

5.5   As a result, the board holds that the patent in suit as claimed according to auxiliary request 1 discloses the invention in a manner sufficiently clear and complete for it to be carried out by a person skilled in the art.

Remittal (Article 111(1) EPC 1973)

6.   The decision under appeal was based on reasons under Articles 83, 84, 100(c), 123(2) and 123(3) EPC of the requests then on file. These grounds for revocation do not apply to the present claims and the decision under appeal must consequently be set aside.

6.1   However, at this stage a patent cannot be maintained in amended form without first being examined for compliance with the other requirements of the Convention. The department of first instance has not taken a decision on the grounds for opposition under Article 100(a) EPC and under these circumstances the parties have requested remittal (see the statement of grounds of appeal, page 1 and point 3 of respondent O2's reply dated 7 February 2012).

6.2   Under these circumstances the board exercises its
         discretion under Article 111(1) EPC 1973 by remitting
         the case to the department of first instance for
         further prosecution.

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.

The Registrar: The Chairman:

K. Boelicke   C. Kunzelmann

Decision electronically authenticated