

Industria y Comercio

SUPERINTENDENCIA

Organizacion CSA Ltda

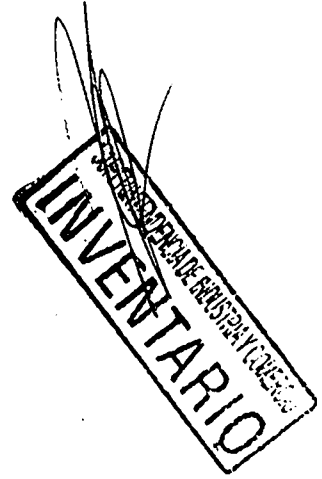
Nov
2004

Delegatura de Propiedad Industrial

División de Nuevas Creaciones

SOLICITUD

PATENTE DE INVENCION



EXPEDIENTE No.

04-63033

DESCARGA PROGRESIVA DE CONTENIDO DE MULTIMEDIA TEMPORIZADA

TITULO

CLASIFICACION INTERNACIONAL

G06F 9/30

NOKIA CORPORATION

SOLICITANTE

Espoo, Finlandia

DOMICILIO

APODERADO

EMILIO FERRERO
CODIGO 1092

BOGOTA, D.C.,

2004-VII-04

82

207038

PETITORIO

SUPERINDUSTRIA Y COMERCIO
Radicación : 04063033 00000000. Folios: 31 ión
Fecha (AMD): 2004-07-01 17:18:39
Trámite : 002 PATENTES D 1 REGISTRO/ 411 PRESENTA
Dependencia: 2020 DIVISION DE NUEVAS CREACIONES

**FORMULARIO UNICO DE SOLICITUD DE PATENTE
2000-3**

1	SOLICITUD DE:		
☒	Patente de Invención	☐	Patente de Modelo de Utilidad
2 SOLICITANTE (71)	Nombre: NOKIA CORPORATION sociedad constituida y existente de acuerdo con las leyes de Finlandia. Dirección: Keilalahdentie 4 FIN-12050 Espoo Finlandia Domicilio: Espoo, Finlandia	IDENTIFICACION C.C. ☐ NIT ☐ C.E. ☐ Otro ☐ Número: _____	
3 REPRESENTANTE O APODERADO (74)	Nombre: Emilio FERRERO Dirección: Carrera 4ª No. 72-35 Teléfono: 347 36 11 E-mail: cavelier@cavelier.com Fax: 217 92 11 Domicilio: Bogotá, Colombia	IDENTIFICACION C.C. ☒ NIT ☐ C.E. ☐ Otro ☐ Número: <u>438.019</u> TP <u>31.929</u>	
4 INVENTOR(ES) (72)	1- MARTA KARCZEWICZ 1224 Hidden Ridge #3097 Irving, TX 75038 Estados Unidos de América 2- SELIM BALCISOY Firin Sokak No. 4 Apakzade Apt. Daire: 21 34738 Erenkoy Istanbul Turquía 3 TOLGA CAPIN 2450 Oak Hill Circle #2531 Fort Worth, TX 76109 Estados Unidos de América.	IDENTIFICACION C.C. ☐ NIT ☐ C.E. ☐ Otro ☐ Número: _____	
5	TITULO (54) DESCARGA PROGRESIVA DE CONTENIDO DE MULTIMEDIA TEMPORIZADA.		
6	Clasificación Internacional (51) H04L 9/00		
7	Prioridad SI ☒ NO ☐	(33) País de Origen <u>US</u> <u>US</u>	(32) Fecha <u>1 de julio de 2003</u> <u>9 de junio de 2004</u>
			(31) Número de Solicitud <u>60/484,507</u> <u>10/865,670</u>
8	Para publicar a partir de la fecha de la presente solicitud a los 6 meses ☐ 12 meses ☐ 18 meses ☒ Otro ☐		
9	Comprobante de pago No. 47.576 Comprobante de pago No. 43.126 Comprobante de pago No. 25.946		Fecha: 15 de junio de 2004 Fecha: 01 de junio de 2004 Fecha: 30 de marzo de 2004

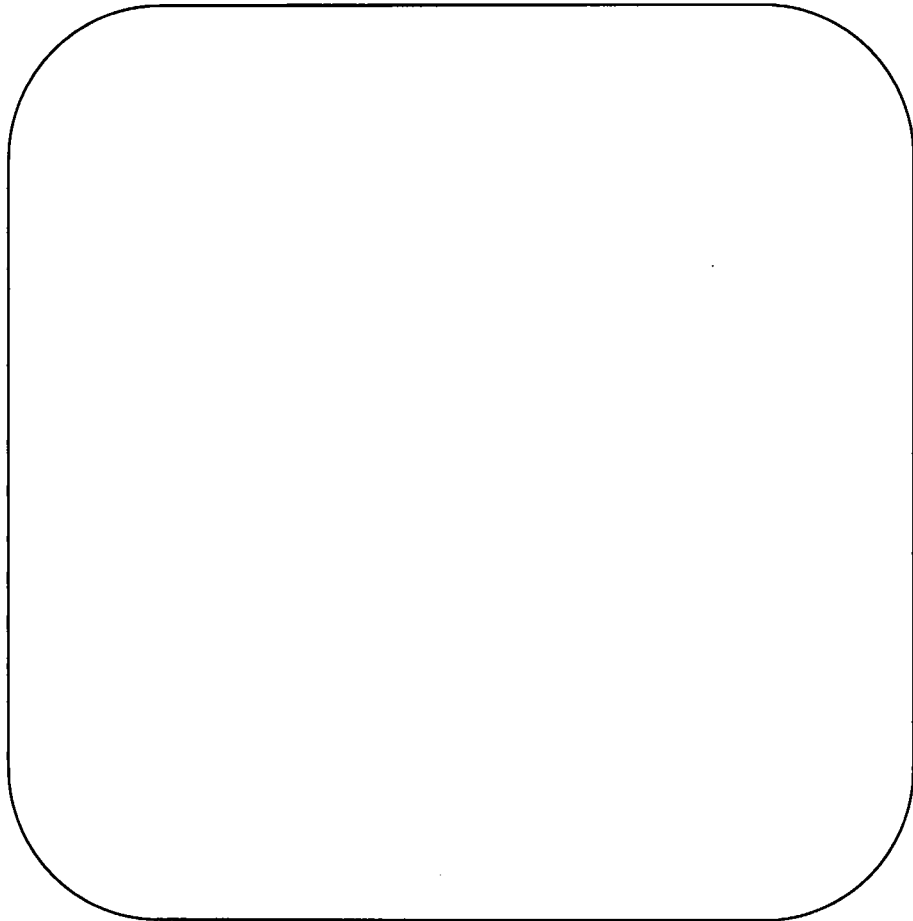
10

ANEXOS

- ☒ Comprobante de pago de la tasa de presentación de la solicitud \$422.000.00
- ☐ Comprobante de pago de la tasa por concepto de excedente de palabras en la publicación
- ☒ Comprobante de pago por reivindicación de prioridad (2 por valor total de \$236.000)
- ☒ Certificado de existencia y representación legal cuando el solicitante sea persona jurídica
- ☒ Poderes, si fuere el caso
- ☐ Copia certificada de la primera solicitud, si se reivindica prioridad
- ☐ Traducción simple de la primera solicitud, si se reivindica prioridad
- ☐ Documento de cesión del inventor al solicitante o a su causante
- ☒ Descripción de la invención
- ☒ Una o más reivindicaciones
- ☒ Dibujos y/o planos necesarios
- ☐ De ser el caso, copia del contrato de acceso
- ☐ De ser el caso, documento que acredite la licencia o autorización de uso de conocimientos tradicionales de las comunidades indígenas
- ☐ De ser el caso, certificado de depósito del material biológico
- ☐ Arte final 12 x 12.

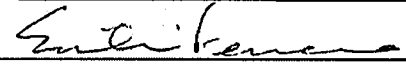
11

FIGURA CARACTERISTICA:

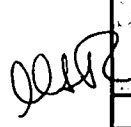


12

NOMBRE: EMILIO FERRERO

FIRMA: 

C.C. 438.019 de Usaquén T.P.A. 31.929



CAVELIER

ABOGADOS
EDIFICIO SISKI
CARRERA 4a. No. 72-35
BOGOTA 8, COLOMBIA

For patents, designs, trademarks, service marks, commercial names, ensings.

Para patentes, modelos, dibujos, marcas de fábrica y de servicio, nombres comerciales y enseñas.

col. 5995

PODER

POWER OF ATTORNEY

Yo (nosotros), abajo firmado (s)

domiciliado (s) en

por el presente conferimos poder a GERMAN CAVELIER, GONZALO PERDOMO y ERNESTO CAVELIER, domiciliados en Carrera 4a. No. 72-35, Bogotá, Colombia, para

para obtener la protección de mi (nuestra) propiedad industrial, y contra la competencia desleal, a cuyo efecto autorizo (amos) a los dichos apoderados para que me(nos) represente(n) ante cualesquiera entidades o personas, ejerzan o no jurisdicción, especialmente ante las del orden administrativo, contencioso-administrativo y judicial, en todo lo concerniente a los siguientes asuntos: a) Obtención de patentes de invención, modelos y dibujos industriales; el registro de marcas de fábrica, colectivas, defensivas y de servicio; el depósito de nombres comerciales y enseñas; su renovación, traspaso, cambio de nombre o domicilio, cancelación voluntaria, y el registro de licencias de uso de esos derechos; b) las acciones de oposición, cancelación, nulidad, medidas cautelares, concesión de licencias y en general los procesos civiles, penales, administrativos o contencioso-administrativos relacionados con estos derechos; acciones y procesos que promovamos o se nos promuevan; y c) para que en todos los asuntos arriba determinados, puedan sustituir este poder, transigir, desistir, cancelar, recibir, renunciar, aceptar notificaciones nombrar apoderados judiciales y extrajudiciales, y ratificar los actos de agentes oficiosos.

Dado y firmado hoy

en

TRADUCCION OFICIAL No. 043/89
ALICIA GROOT
INTERPRETE OFICIAL
RESOLUCION No. 2195, ABRIL 17, 1988
DEL MINISTERIO DE JUSTICIA

NOKIA CORPORATION

Olli-Pekka Kallasvuori

Assistant Vice President
Financial Planning

I (we), the undersigned

NOKIA CORPORATION

of Helsinki, Finland, with offices at Keilalahdentie, 4 02150 Espoo, Finland. hereby grant to GERMAN CAVELIER, GONZALO PERDOMO and ERNESTO CAVELIER, domiciled at Carrera 4a. No. 72-35, Bogotá, Colombia, Power of Attorney to

register the trade mark NOKIA and the trade mark NOKIA device

JAT

and to obtain the protection of my (our) industrial property and against unfair competition, for which purpose I (we) authorize the said attorneys to represent us before any authorities or persons, with or without jurisdiction, specially those administrative, administrative contentious and judicial, in all matters concerning the following: a) Obtainment of patents, models and designs; the registration of trademarks, collective, defensive and service marks; the deposit of commercial names and ensings; its renewal, assignment, change of name or domicile, voluntary cancellation; and the registration of licenses of use of the above rights; b) actions of opposition, cancellation, nullity, infringement, granting of licenses; and in general the civil, penal, and administrative suits relating to those rights; actions and suits instituted by me (us) or against me (us); and that in all the above matters they may substitute this Power of Attorney, compromise, desist, cancel, receive, renounce, accept notifications appoint attorneys-in-fact in or out of Court, and ratify the acts made by agents without power of attorney.

Given and signed this

in Helsinki, November 8, 1988

Taavi Heikilä

signature
General Counsel

13 ENE 2004
JUAN MANUEL LOPEZ MEDINA
NOTARIO

This is to certify the above own hand signatures of Olli-Pekka Kallasvuo and Taavi Heinilä and that they are legally authorized jointly to sign Nokia Corporation;

Helsinki City-Hall, the 14 th of November 1998

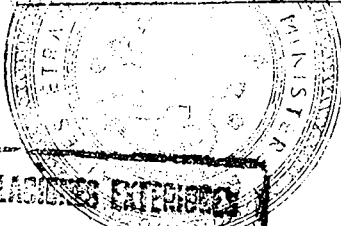
By virtue of office

Olli-Pekka Siro
Notary Public



the Ministry for Foreign Affairs, Helsinki,
Notary Public, Helsinki,
whereby the above named persons under the
foregoing conditions, I authorized to issue
certificates of their nature.
At Helsinki, November, 29 1998
No 10504
Stamp mks *les* *Paul Laamanen*

PAULA LAAMANEN
Departmental Secretary



RELAÇÕES EXTERIORES
REALIZACIONES
1 - MAR. 1998
NO 45434

Nicolas Salonen
Nicolas Lauri

CONSULADO DE COLOMBIA

18-12-1998

Número 436/98

Paula Laamanen

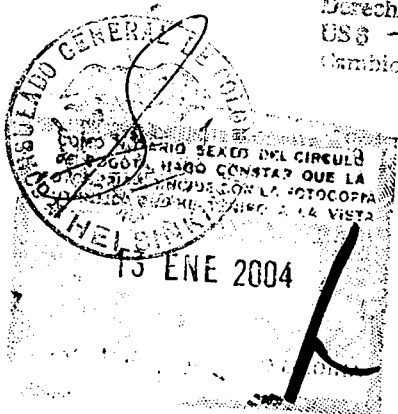
Secretaria Departamental
Minrelaciones Helsinki

DERECHOS A PAGAR
EN CASH

MIGUEL E. MOSCOSO
Jefe de Negocios

El Consulado asume responsabilidad alguna por el contenido del documento cuya firma se autentica.

Derechos percibidos
US\$ — — —
Cambio US\$ =



TRADUCCION OFICIAL No. 043/89
ALICIA GROOT
INTERPRETE OFICIAL
RESOLUCION No. 2195, ABRIL 17, 1960
DEL MINISTERIO DE JUSTICIA.

881051766146
FEB. 28 1989
BANCO DE CALDAS
AVDA CHILE



DECLARACIÓN Y PAGO DEL IMPUESTO DE TIMBRE NACIONAL

BANCO DE CALDAS
18-037-01-002526-8
18-037-01-002526-8

DATOS GENERALES	1 Administración de Impuestos de: BOGOTA		Código 03	2 Teléfono 2120100
	3 Documento de Identificación (marque X) C.C. ó T.I. ☐ C ☐ NIT. ☐ A ☒ X No. 860041367 D.V. 3		4 Apellidos y Nombres o Razón Social de las partes (máximo 60 caracteres). CAVELIER ABOGADOS	
	5 C.C. ó T.I. ☐ C ☒ X NIT. ☐ A ☐ No. 19'30 1.629 D.V. ☐		6 Apellidos y Nombres o Razón Social de las partes (máximo 60 caracteres). FORERO ROCHA JAIME	
	7 Dirección (de la persona o entidad identificada en la casilla 4) Cra. 4a. No. 72-35		Municipio BOGOTA	Departamento CUNDINAMARCA
	8 Número documentos Unbrados. 1			
CONCEPTO	9 Relación el(los) tipo(s) de documento(s), indicando número, fecha, valor y naturaleza de la transacción TIMBRE DERECHOS CONSULARES DE UN PODER DE NOVIEMBRE 8 DE 1988 PAGO DERECHOS QUE CAUSA LA FIRMA CONSULAR COLO 5995-51-001-2			

FIRMA	Responsable del pago	FORMA DE PAGOS EN BANCOS FORMA DE VALORES	1 VALOR DEL IMPUESTO A PAGAR	VP	4200
	Nombre		2 Sanciones	VS	0-
	C.C. No. 19301629 36		3 Intereses de mora	IM	0-
			4 TOTAL A PAGAR (renglones 1 + 2 + 3)	TP	4200
			4200 Efectivo ☒ Cheque ☐ No. 1		
				Código Banco	

TRADUCCIÓN OFICIAL No. **043/89**
AUDIA GROOT
INTERPRETE OFICIAL
RESOLUCION No. 2192, ABRIL 17, 1989
DEL MINISTERIO DE JUSTICIA.

BANCO DE CALDAS
AVDA CHILE
FEB. 28 1989
RECIBIDO CON PAGO

COMO NIT...
15 ENE 2004



CONSULADO GENERAL DE COLOMBIA

CONSULADO GENERAL DE COLOMBIA EN HELSINKI No. 004

El suscrito Encargado de las Funciones Consulares de Colombia en Helsinki, vistos los documentos presentados por los interesados: CERTIFICA

Que el Señor Olli-Pekka Siro, quien como Notario Público en Helsinki autenticó la firma de los Señores Olli-Pekka Kallasvuo, Asistente del Vice-presidente de Planeación Financiera de Nokia Corporación y del Señor Taavi Heinilä, Abogado General de Nokia Corporation, ejercía en la fecha las funciones indicadas, de conformidad con la legalización de su firma por parte de la Señora Paula Laamanen, Secretaria de Departamento en el Ministerio de Relaciones Exteriores de Helsinki. Que la compañía Nokia Corporation, con sede en Helsinki, es una sociedad constituida de acuerdo con las leyes de Finlandia y cumple su objeto conforme a las mismas. Que los Señores Olli-Pekka Kallasvuo y Taavi Heinilä, están debidamente autorizados para suscribir el presente documento de acuerdo con los Estatutos respectivos y su firma fué autenticada por el Notario Público de Helsinki, quien dió fe de lo anterior, como consta en el documento anexo.

El Encargado de las Funciones Consulares no asume responsabilidad alguna por el contenido del presente documento.

Se expide esta certificación en Helsinki, a los seis (6) días del mes de Febreo de mil novecientos ochenta y nueve (1989)

Derechos percibidos

US\$ 6. = 25.000.000

Cambio 1US\$ = 4.266

MINISTERIO DE RELACIONES EXTERIORES

LEGALIZACIONES

1 - MAR. 1989 043435

Bogotá No.

HACE CONSTAR

Que el Señor *Nicolas Sabana*

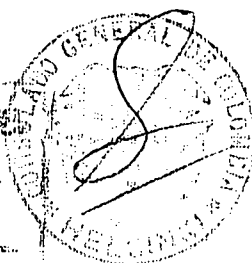
cuya firma aparece al pie del presente documento, desempeña en esa fecha las funciones allí indicadas.

MIGUEL E. NOBOCOCO ACUÑA

Jefe de Negocios Generales

División Consular

Encargado



TRANSCRIPCION OFICIAL No. 043/89

AUDIA GROOT

INTERPRETE OFICIAL

RESOLUCION DEL RICO, ABRIL 17, 1989

DEL PODER JUDICIAL DE JUSTICIA

COMO NOTARIO DEL CIRCULO DE BOGOTA, HAGO CONSTAR QUE LA FOTOCOPIA CONFORME CON LA FOTOCOPIA AUTENTICA QUE SE MOSTRO A LA VISTA

13 ENE 2004

JUAN MANUEL L. TORO MEDINA

NOTARIO

881051766164

BANCO DE CALDAS
AVDA. CHILS

MAR. 6 - 1989

BANCO DE CALDAS

RECIBIDO CON PAGO

18-037-01-002540-1



DECLARACION Y PAGO DE IMPUESTO DE TIMBRE NACIONAL

DATOS GENERALES	1 Administración de Impuestos de: BOGOTA		Código 03	2 Teléfono 2120100
	3 Documento de identificación (marque X) C.C. ó T.I. ☐ ☐ NIT. ☐ ☒ No. 860041367 D.V. ☐		4 Apellidos y Nombres o Razón Social de las partes (máximo 60 caracteres). CAVELIER ABOGADOS	
	5 Documento de identificación (marque X) C.C. ó T.I. ☐ ☒ NIT. ☐ ☐ No. 19'301.629 D.V. ☐		6 Apellidos y Nombres o Razón Social de las partes (máximo 60 caracteres). FORERO ROCHAJAIME	
	7 Dirección (de la persona o entidad identificada en la casilla 4) Cra. 4a. No. 72-35		Municipio BOGOTA	Departamento CUNDINAMARCA
	8 Número documentos timbrados. 1			
CONTENIDO	9 Relación el(los) tipo(s) de documento(s), indicando número, fecha, valor y naturaleza de la transacción TIMBRE TRADUCCION OFICIAL No. 043/89 DE MARZO 5 DE 1989 PAGO DERECHOS TRADUCCION DE UN PODER COLO 5995-51-001-2			

FIRMA	Responsable del pago
	Nombre Forero Rocha Jaime C.C. No. 19301629

PAGO EN BANCOS FORMA VALORES	1 VALOR DEL IMPUESTO A PAGAR	VP	500
	2 Sanciones	VS	00
	3 Intereses de mora	IM	00
	4 TOTAL A PAGAR (renglones 1 + 2 + 3)	TP	500
Efectivo ☒ Cheque ☐ No. 00		Código Banco 00	

BANCO DE CALDAS
AVDA CHILS
MAR. 6 - 1989
RECIBIDO CON PAGO

CONTRIBUYENTE

COMO NOTARIO SEÑALO DEL CIRCULO
DE BOGOTA, QUE CONSTA QUE LA
FIRMA DEL CONTRIBUYENTE
HA SIDO LEIDA A LA VISTA
13 ENE 2004
JUAN MANUEL FORERO LLODINA
NOTARIO

2

TRADUCCION OFICIAL No. 043/89 de un documento escrito en Inglés, el cual para su identificación se sella con el sello del traductor lo mismo que la presente. ----- Autenticaciones que se hallan a continuación de un Poder, escrito en Inglés y en Español, otorgado por la sociedad NOKIA CORPORATION a los doctores GERMAN CAVELIER, GONZALO PERDOMO y ERNESTO CAVELIER.

Dado y firmado el día 8 de noviembre de 1988, en Helsinki, Finlandia.

NOKIA CORPORATION

(firmado) (firma ilegible)	(firmado) (firma ilegible)
Olli-Pekka Kallasvuo	Taavi Heinila
Vicepresidente Adjunto	Asesor Legal General
Planeación Financiera	

Al dorso hay una certificación en Inglés que dice:
Por medio del presente se certifican las anteriores firmas de puño y letra de Olli-Pekka Kallasvuo y Taavi Heinila y que están legalmente autorizados para firmar conjuntamente por Nokia Corporation:

Helsinki, Ayuntamiento, Noviembre 14 de 1988.

Por virtud del cargo:

(firmado) (firma ilegible)

Olli-Pekka Siro

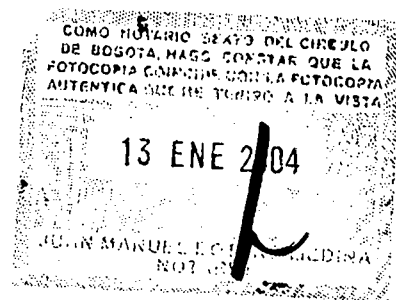
Notario Público

Sello Notarial.

Hay un sello en inglés que dice:

El Ministerio de Relaciones Exteriores certifica que Olli-Pekka Siro, Notario Público de Helsinki, cuya firma y sello aparecen en el anterior certificado, está autorizado para expedir certificados de esa naturaleza.

Helsinki, Noviembre 29 de 1988.



TRADUCCION OFICIAL No. 043/89
ALICIA GROOT
INTERPRETE OFICIAL
RESOLUCION No. 2195, ABRIL 17, 1968
DEL MINISTERIO DE JUSTICIA.

No. 10504

Estampilla mks(sic) (ilegible)

(firmado) Paula Laamanen

Secretaria Departamental

Sello del Ministerio de Relaciones Exteriores.

En español, legalizaciones de la firma que antecede, hasta por el Ministerio de Relaciones Exteriores de la República de Colombia, bajo los Números 043433 y 043434, de fecha 10. de marzo de 1989.

Derechos Consulares pagados por la suma de Ps.\$4.200, según recibo No. 881051766146, del Banco de Caldas, Sucursal Avenida Chile, de fecha 28 de febrero de 1989.

ES TRADUCCION FIEL Y COMPLETA del documento en referencia.

Bogotá, Marzo 5 de 1989.

AG/c.

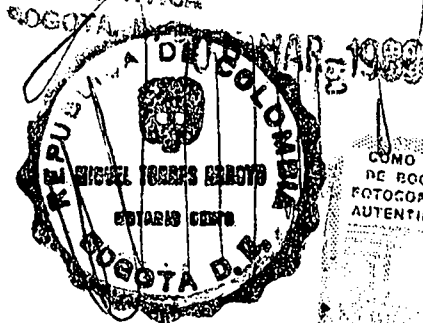
Alicia Groot

TRADUCCION OFICIAL No. 043/89
ALICIA GROOT
INTERPRETE OFICIAL
RESOLUCION No. 2199, ABRIL 17, 1969
DEL MINISTERIO DE JUSTICIA.

COMO NOTARIO SEXTO DE BOGOTA
HAGO CONSTAR QUE LA FIRMA
QUE AUTORIZA ESTE DOCUMENTO
Y QUE DICE:

Alicia Groot

ES AUTENTICA



COMO NOTARIO SEXTO DEL CIRCULO
DE BOGOTA, HAGO CONSTAR QUE LA
FOTOCOPIA CON QUE SE PRESENTA
AUTENTICA QUE SE TIENE A LA VISTA

13 ENE 2004

JUAN MANUEL L. GARCIA
NOTARIO

MINISTERIO DE RELACIONES
EXTERIORES

112660
Alicia Groot
CONFIRMA APARECER EN EL
DOCUMENTO DESCRIPCION
LAS FUNCIONES INDICADAS

NO SE ASUME
RESPONSABILIDAD DEL TEXTO

2001 MAR -11 A 11:51
[Signature]
JEFE DE LEGALIZACION
SECRETARIA DE NEGOCIA

COMO MATERIAL SUJETO DEL CIRCULO
DE BOBOTE, HAGO CONSTAR QUE LA
FOTOCOPIA COINCIDE CON LA FOTOCOPIA
AUTENTICA QUE HE TENIDO A LA VISTA
13 ENE 2004
[Signature]

9

CAVELIER
ABOGADOS

WEB SITE: www.cavelier-abogados.com
E-MAIL: cavelier@colomsat.net.co

EDIFICIO SISKI
CARRERA 4 No. 72 - 35
BOGOTA 8, COLOMBIA

TELEFONO: (57) (1) 347-3611
TELEFAX: (57) (1) 217-9211 (57) (1) 310-4995

Señora Jefe de la

DIVISION DE NUEVAS CREACIONES

Superintendencia de Industria y Comercio

E. S. D.

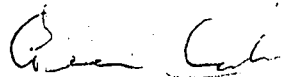
Poderdante: NOKIA CORPORATION

Poder conferido el: 08-11-88

Yo, GERMAN CAVELIER, obrando en mi calidad de apoderado principal del poderdante arriba mencionado, atentamente manifiesto a Usted que sustituyo el poder que me ha sido conferido en la persona del doctor EMILIO FERRERO, Abogado con Tarjeta Profesional No. 31.929, con todas las facultades que me fueron conferidas.

Hago la anterior sustitución conforme al artículo 66 del Código de Procedimiento Civil ya que los otros sustitutos faltan en este momento.

Señora Jefe,



GERMAN CAVELIER

T.P.A. No. 832

C.C. No. 2.877.924 de Bogotá

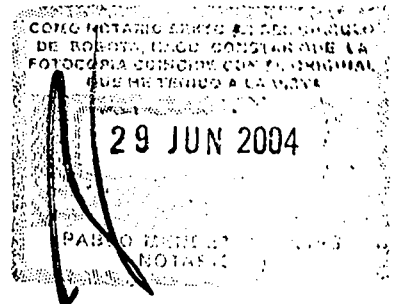
Acepto:



EMILIO FERRERO

T.P.A. N° 31.929

C.C. No. 438.019 de Usaquén



...A SEXTA DE ...
...CONOCIMIENTO Y PRESENTACION PERSONAL
26 ENE. 2004
...MANUEL BOTERO MEDINA
NOTARIO SEXTO DEL CIRCULO DE BOGOTA

Concedieron:

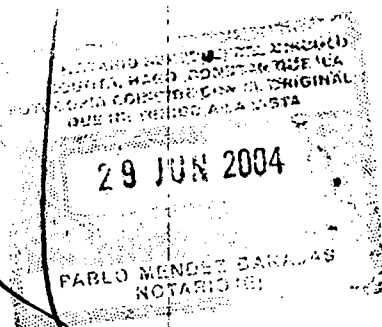
quien(es) exhibió(eron) la(s) C.C.

7877924 8888
438019 8888

y declararon que la(s) firma(s) que aparece(n)
en el presente documento es(son) la(s) suya(s) y
que el contenido del mismo es cierto. En consian-
cia se firma esta diligencia.

Geni Carl

Emilio R...



PROGRESSIVE DOWNLOADING OF TIMED MULTIMEDIA CONTENT

Field of the Invention

The present invention relates generally to downloading of files and, more
5 specifically, to start-up delay in progressive downloading.

Background of the Invention

In progressive downloading of multimedia content, the client usually buffers some
data for a certain time so that decoding of the content can be carried out properly and in a
10 timely manner. If the client starts playing the content too early, some parts of the content
may still be downloaded when they should already be played. On the other hand, if the
client starts playing the content very late or the start-up delay is very long, the client
needs an unnecessarily large buffer to store the already downloaded files. It is desirable
to minimize the start-up delay so that the client can begin playing the content before the
15 downloading of the entire file is finalized.

Let us use files that contain the Scalable Vector Graphics (SVG) as an example.
SVG is a language for describing two-dimensional graphics in XML (eXtensible Markup
Language), which allows for three types of graphic objects: vector graphic shapes, images
and text (*see Scalable Vector Graphics 1.1 Specification, W3C Recommendation, 14*
20 *January 2003*). Graphic objects can be grouped, transformed and composed from
previously rendered objects. SVG drawings can be interactive and dynamic and can also
be used in animation. SVG content can be arranged in groups such that each of them can
be processed and displayed independently from the following groups (groups delivered
later in time). Groups are referred to hereafter as scenes. To each scene we can assign a
25 *content presentation time* (or *content start time*) inferred from the content at which its
presentation should start with relation to other scenes.

When the client downloads an SVG file stored on a server, the file is received at a
given bit rate depending on the bandwidth available between the client and the server and
is stored in the client's buffer. When the desired *start-up delay* is reached, the client
30 starts displaying the content of the file. Start-up delay is the difference between the
beginning of the file download and the start of the file's content presentation.

It has been realized that while it is desirable to minimize the start-up delay such
that the client can begin playing the content before the downloading of the entire file is

finalized, the start-up delay has to be sufficient to ensure that each scene is received before its player presentation time.

Currently, the start-up delay for use in conjunction with vector graphics is estimated based on the size of the file and its duration (playing time) that can be inferred from information, such as file length, frame rate and frame count given at the beginning of the file. However, in many instances, the client cannot estimate accurately the start-up delay for content such as SVG based only on this information.

Thus, it is advantageous and desirable to provide a method and a mechanism to allow the client to estimate the start-up delay correctly in order to minimize the memory usage. Furthermore, it is advantageous that the client knows which parts of the file can be discarded after presenting them so as to further minimize the memory usage.

Summary of the Invention

The present invention provides a method for progressive downloading of timed content, wherein a table that specifies the properties for the scenes in the content is provided by the server so as to allow the client to compute the appropriate start-up delay. The table may list the size, start time and minimum transmission rate for each scene. Additionally, the end time for each scene may be given in order to save memory.

Thus, according to the first aspect of the present invention, there is provided a method of signaling in a network, the network having a least a client, and a server for transmitting to the client data having a plurality of components, the components having various content properties, so as to allow the client to download the data in a client buffer before presenting at least a part of the data, each component having a component size. The method comprises:

conveying to the client information indicative of the content properties of the components; and

determining in the client, responsive to the information, a start-up delay in the presentation based on the content properties of the components.

The information may be indicative of the content presentation times of the components and further indicative of content end times of the components.

The method further comprises the step of presenting the components at player start times of the components based on the start-up delay and the content presentation times of the components.

The information may be further indicative of content end times of the components, and the method further comprises the step of removing a portion of the data after presenting said portion of the data based on the content start times and the content end times of the components.

- 5 The information may be indicative of the component sizes.
 The information is conveyed to the client prior to the downloading of the data.
 The information may be indicative of minimum bandwidths for the components based on the transmission rate.

- The content properties comprise content presentation times of the components and
10 content end times of the components, and the method further comprises:
 presenting the components at player start times of the components based on the component size and the content presentation times of the components; and
 removing one or more components after presenting said one or more components based on the content presentation times and the content end time of said one or more
15 components while presenting other components in the data.

According to the second aspect of the present invention, there is provided a multimedia system, which comprises:

- at least a client having a data buffer, and
 at least a server for transmitting to the client data having a plurality of
20 components, the components having various content properties so as to allow the client to download the data in the data buffer before presenting at least a part of the data, each component has a component size,
 the server comprising:
 - means for determining the content presentation times of the components
25 based on the component sizes and the content properties of the components; and
 - means for conveying to the client information indicative of the presentation times of the components, and
 - the client comprising:
 - means for receiving the conveyed information; and
 - 30 means for determining a start-up delay in the presentation based on the received information.
- The client further comprises

means for presenting the data according to player start times of the components based on the start-up delay and the content presentation times of the components.

The conveyed information is further indicative of content end times of the components and the client is adapted to

- 5 removing one or more components after presenting said one or more components based on the content presentation times of the components and the content end times of the components.

The information may be indicative of minimum bandwidths in transmitting the components based on the transmission rate, and the client is adapted to removing one or
10 more components after presenting said one or more components based on the content presentation times and the minimum bandwidths of the components.

According to the third aspect of the present invention, there is provided a server in a multimedia network, the network having at least a client, the server is adapted to transmit to the client data having a plurality of components, the components having
15 various content properties, so as to allow the client to download the data in a client buffer before presenting at least a part of the data, each component having a component size. The server comprises:

means for determining the content presentation times of the components based on the component sizes and the content properties of the files; and

- 20 means for conveying to the client information indicative of the presentation times so as to allow the client to determine a start up delay in the presentation based on the information.

According to the fourth aspect of the present invention, there is provided a client in the multimedia network, the network having at least a server for transmitting to the
25 client data having a plurality of components, the components having various content properties so as to allow the client to download the data before presenting at least a part of the data, each component having a component size, wherein the server further transmits to the client information indicative of the content properties of the components. The client comprises:

- 30 a buffer for storing at least part of the data; and

means, responsive to the information, for determining a start up delay in the presentation based on the content properties of the components.

According to the fifth aspect of the present invention, there is provided a computer program for use in a server in a network, the network having at least a client, wherein the server is adapted to transmit to the client data having various content properties, so as to allow the client to download the data in a client buffer before presenting at least a part of the data, each component having a component size. The computer program comprises:

5 the data, each component having a component size. The computer program comprises:
a first code to determine the presentation times based on the component size and the content properties of the files; and

a second code to generate information indicative of the presentation times, so as to allow the client to determine a start up delay in the presentation.

10 According to the sixth aspect of the present invention, there is provided a computer program for use in a client in a network, the network having at least a server for transmitting to the client data having various content properties, so as to allow the client to download the data in a client buffer before presenting at least a part of the data, each component having a component size, wherein the server is adapted to transmit to the

15 client information indicative of the content properties. The computer program comprises:
a code to determine a start up delay in the presentation; and
a code to determine player start times of the components based on the content properties and the start-up delay in the presentation.

The present invention will become apparent upon reading the description taken in
20 conjunction with Figures 1 and 2.

Brief Description of the Drawing

Figure 1 is a block diagram illustrating a network system having a server and a client, wherein the client has a software program for determining the start-up delay,
25 according to the present invention.

Figure 2 is a flowchart illustrating the method for determining the start-up delay at a client, according to the present invention.

Detailed description of the Invention

30 Figure 1 shows a network system 1 having a multimedia server 10 and a multimedia client 50. The server 10 is used to send encoded data to the client 50 through a network 30 so that the client 50 can decode the data for playing on a playing device 70.

The server 10 has data storage 22 for storing files to be transmitted to the client 50 via a transmitter 28. The server 10 also has a software program 24 having executable codes for generating a table 26 listing the properties of the scenes in the files, so as to allow the client 50 to estimate the start-up delay. For example, the software program 24 includes a scene property algorithm 25 for carrying out said listing.

The client 50 has a data buffer 60 for storing the files downloaded via a receiver 68 from the server 10 for a certain time so that the content of the downloaded files can be decoded by the decoder 66 and played on the playing device 70 properly. In order to minimize the memory usage, the client 50 has a software program 62 having executable codes for computing the appropriate start up delay and player start time. For example, the software program 62 includes an algorithm 64 for computing the start up delay time. The computer program 62 also comprises other executable codes for computing the player start time and for determining when to remove one or more components in the data buffer 60 after the components have be presented.

Let us consider the following example. The size of the SVG file is equal to 175 kbits and its duration is 9 sec. The file contains an animation presentation comprising 7 scenes as listed in Table I. Table I lists the size after compression and the content start time for each scene. It should be noted that the presentation of scene 4 starts at the same time as scene 5. This means that the file for scene 4 may include only the definition of elements used in the three following scenes: scenes 5, 6 and 7. In that respect, the properties of one or more scenes in the content may be different from the other scenes. Due to the difference in properties, the files may not be presented in a sequential manner in reference to the order in which the files are downloaded.

In assigning the content presentation times, it is initially assumed that start-up delay is equal to 0. Client then calculates the values of the start-up delay and the *player start time (player presentation time)* by offsetting the content start time for each scene by the start-up delay. For example, if the start-up delay is equal to 2 sec, the player start time for the scene 1 is equal to 2 sec instead of 0 as listed in the table.

Scene number	Compressed size [kbits]	Content start time [s]
1	20	0

2	20	1
3	20	2
4	100	3
5	5	3
6	5	5
7	5	7

TABLE I

In order to minimize the start-up delay, the client can begin playing the content before downloading the entire file is finalized. However, the start-up delay has to be sufficient to ensure that each scene is received before its player presentation time. For example, let us assume the available bandwidth is equal to 20 kbits/sec when the file as described in Table I is downloaded. If the client decides to start playing the content after receiving the first scene (scene 1), the start-up delay is equal to 1 sec. Accordingly, the player start time for scene 5 is equal to 4 sec when taking into account the start-up delay of 1 sec. With the available bandwidth of 20 kbits/sec, the file for scene 5 will be completely downloaded after 8.25 sec (165 [kbits] / 20 [kbits/sec]), or 4.25 sec after it should be presented at t=4 sec. Obviously, it is impossible to present a scene before it is downloaded. Thus, it is necessary for the client to start play the content at a later time.

To demonstrate that it is not sufficient to rely only on the knowledge of the total file size and its duration for estimating the start-up delay correctly, let us again refer to the file as describe in Table I and assume the available bandwidth of 20 kbits/sec. As mentioned earlier, the size of the entire SVG file is 175 kbits and its duration is 9 sec. It requires 8.75 sec (175 [kbits] / 20 [kbits/sec]) for the file to be fully received. Thus, the required time to receive is less than the duration. However, if the client decides to start presentation of the file content immediately after receiving the first scene, based on his knowledge of the total file size and its duration, scene 5 will not be received in time, as demonstrated earlier.

According to the present invention, the table 26 lists the size and content presentation time of some or all scenes, as shown in Table II. The client 50 will receive the scene properties prior to receiving the actual content of the scenes (data).

Size (Scene 1)
Content Presentation Time (Scene 1)
Size (Scene 2)
Content Presentation Time (Scene 2)
...
Size (Scene n)
Content Presentation Time (Scene n)
Data (Scene 1)
Data (Scene 2)
...
Data (Scene n)

TABLE II

Alternatively, the scene information as listed in table 26 includes minimum
5 bandwidth B_m (minimum rate) in transmission to ensure that each remaining scene will be
available before its player presentation time – in case the client decides to start the
presentation of the entire file after the reception of this scene. If the estimated bandwidth
is equal to B , the client can start playing the content of the file after receiving the scene
for which the minimum rate value B_m is larger than B . Minimum rates for all the scenes
10 do not have to be included at the beginning of the file. It is sufficient if the minimum rate
for each scene is received together with that scene. The structure of the file is in this case
is as follows:

Minimum Rate (Scene 1)
Minimum Rate (Scene 2)
...
Minimum Rate (Scene n)
Data (Scene 1)
Data (Scene 2)
...
Data (Scene n)

TABLE III

For the file as described in Table I, the minimum rates rounded up to the nearest
5 kbits/sec are as follows:

	Scene 1:	49
	Scene 2:	42
	Scene 3:	35
10	Scene 4:	3
	Scene 5:	2
	Scene 6:	1

Accordingly, if the estimated bandwidth is equal to 20 kbits/sec the client can start
15 the presentation of the file after receiving scene 4, to which the assigned value of
minimum rate in transmission is equal to 3 kbits/sec.

In order to compute the minimum rate for each scene, the software program 24
may have the following pseudo code:

```

20  scene_size={20, 20, 20, 100, 5, 5, 5};
    content_start_time={0, 1, 2, 3, 3, 5, 7};
    number_of_scenes=7;

    for (i=1; i<number_of_scenes; i++){
25      cumulative_size[i-1]=0;
      for (j=i; j<number of scenes; j++){
        cumulative_size[j]=cumulative_size[j-
          _1]+scene_size[j];
      }
30    minimum_rate[i-1]=0;
    for (j=i; j< number_of_scenes; j++){
      rate=cumulative_size[j]/content_start_time[j];
      _if (rate>minimum_rate[i-1]){

```

```
        minimum_rate[i-1]=rate;  
    }  
}  
}
```

5

It should be noted that not all the scenes in the SVG file will have their end times explicitly specified. For example, the file scene 4 as described in Table I can simply be a definition of elements used in following scenes. Thus, in order to provide a hint to the client as to how long each scene should be kept in the memory, the *content end time* for each scene may also be signaled to the client 50. Using the scene examples from Table I, the content start time and the content end time are listed in Table IV. As can be seen in Table IV, all the scenes with the exception of scene 4 can be discarded immediately after they are presented.

15

Scene number	Content start time [s]	Content end time [s]
1	0	1
2	1	2
3	2	3
4	3	9
5	3	5
6	5	7
7	7	9

TABLE IV

Alternatively we can specify that a given scene should be kept until the arrival and display of scene number m. For example, scene 1 has to be kept until the end of its own presentation, i.e., m=1. Scene 4 has to be kept until the end of the presentation of scene 7, i.e., m=7. Each of the other scenes has also to be kept until the end of its own presentation.

20

In sum, the signal method for use in the client to determine the start-up delay can be based on the sizes and the content presentation times of the data components or the minimum rate in transmission of the data components. As shown in the flowchart 100, the client obtains available bitrate or bandwidth at step 110. At step 120, it is determined
5 whether the information received from the server contains the size of the data components or the minimum bandwidth. If the information is indicative of the size of the data components, the client computes cumulative sizes for components at step 130 and divides the cumulative sizes, at step 132, by the available bitrate as obtained step 110 in order to obtain the "cumulative play times". The client subtracts the content start time, at step
10 134, from the cumulative play times for determining the start-up delay at step 150. Alternatively, if the minimum bandwidths for the data components are available from the information conveyed by the server, the client finds first component where minimum rate for component is greater than the average rate, at step 140, in order to determine the start-up delay at step 150.

15 Furthermore, when the content end time for each scene is provided to the client, the client can further minimize the memory usage by selectively discarding the scenes in the SVG files based on the provided information.

Although the invention has been described with respect to a preferred embodiment thereof, it will be understood by those skilled in the art that the foregoing and various
20 other changes, omissions and deviations in the form and detail thereof may be made without departing from the scope of this invention.

What is claimed is:

1. A method of signaling in a network, the network having a least a client, and a server for transmitting to the client data having a plurality of components, the components
5 having various content properties, so as to allow the client to download the data in a client buffer before presenting at least a part of the data, each component having a component size, said method characterized by:
conveying to the client information indicative of the content properties of the components; and
10 determining in the client, responsive to the information, a start-up delay in the presentation based on the content properties of the components.
2. The method according to claim 1, characterized in that the information is indicative of the content presentation times of the components.
15
3. The method according to claim 1 or claim 2, characterized in that the information is indicative of the component sizes.
4. The method according to anyone of claims 1 - 3, characterized in that the
20 information is conveyed to the client prior to the downloading of the data.
5. The method according to claim 2, characterized in that the information is further indicative of content end times of the components.
- 25 6. The method according to claim 2, further characterized by:
presenting the components at player start times of the components based on the start-up delay and the content presentation times of the components.
7. The method according to claim 6, characterized in that the information is further
30 indicative of content end times of the components, said method further characterized by:
removing a portion of the data after presenting said portion of the data based on the content start times and the content end times of the components.

8. The method according to any one of claims 1 - 7, characterized in that the data is transmitted at a transmission rate in the network, and that the information is indicative of the transmission rate.
- 5 9. The method according to any one of claims 1 - 7, characterized in that the data is transmitted at a transmission rate in the network, and that the information is indicative of minimum bandwidths for the components based on the transmission rate.
- 10 10. The method according to any one of claims 1 - 5, characterized in that the content properties comprise content presentation times of the components and content end times of the components, said method further characterized by:
- presenting the components at player start times of the components based on the component size and the content presentation times of the components; and
- 15 removing one or more components after presenting said one or more components based on the content presentation times and the content end time of said one or more components while presenting other components in the data.
11. A multimedia system characterized by:
- 20 at least a client having a data buffer, and
- at least a server for transmitting to the client data having a plurality of components, the components having various content properties so as to allow the client to download the data in the data buffer before presenting at least a part of the data, each component has a component size, wherein
- 25 the server comprises:
- means for determining the content presentation times of the components based on the component sizes and the content properties of the components; and
- means for conveying to the client information indicative of the presentation times of the components, and
- 30 the client comprises:
- means for receiving the conveyed information; and
- means for determining a start-up delay in the presentation based on the received information.

12. The system according to claim 11, characterized in that
the means for determining the content presentation times is also for determining
the component sizes, and that
- 5 the means for conveying to the client information indicative of the presentation
times is also for conveying to the client information indicative of the component sizes.
13. The system according to claim 11 or 12, characterized in that the client further
comprises:
- 10 means for presenting the data according to player start times of the components
based on the start-up delay and the content presentation times of the components.
14. The system according to claim 13, characterized in that
the conveyed information is further indicative of content end times of the
- 15 components and that
the client is adapted to removing one or more components after presenting said
one or more components based on the content presentation times of the components and
the content end times of the components.
- 20 15. The system according to any one of claims 11 - 14, characterized in that the
information is conveyed to the client prior to the downloading of the data.
16. The system according to any one of claims 11 - 15, characterized in that the data
are transmitted at a transmission rate and the information is indicative of minimum
- 25 bandwidths in transmitting the components based on the transmission rate.
17. The system according to claim 16, characterized in that the client is adapted to
removing one or more components after presenting said one or more components based
on the content presentation times and the minimum bandwidths of the components.
- 30 18. A server device in a multimedia network, the network having at least a client, the
server device is adapted to transmit to the client data having a plurality of components,
the components having various content properties, so as to allow the client to download

the data in a client buffer before presenting at least a part of the data, each component having a component size, said server device characterized by:

means for determining the content presentation times of the components based on the component sizes and the content properties of the files; and

5 means for conveying to the client information indicative of the presentation times so as to allow the client to determine a start up delay in the presentation based on the information.

19. The server device according to claim 18, characterized in that
10 the means for determining the content presentation times is also for determining the component sizes, and that

the means for conveying to the client information indicative of the presentation times is also for conveying to the client information indicative of the component sizes.

15 20. The server device according to claim 18 or 19, characterized in that the information is conveyed to the client prior to transmitting of data to the client.

21. The server device according to any one of claims 18 - 20, characterized in that the data are transmitted at a transmission rate, and the information is indicative of minimum
20 bandwidths in transmitting the components based on the transmission rate.

22. A client device in the multimedia network, the network having at least a server for transmitting to the client device data having a plurality of components, the components having various content properties so as to allow the client device to download the data
25 before presenting at least a part of the data, each component having a component size, wherein the server further transmits to the client device information indicative of the content properties of the components, said client device characterized by:

a buffer for storing at least part of the data; and

means, responsive to the information, for determining a start up delay in the
30 presentation based on the content properties of the components.

23. The client device according to claim 22, characterized in that the information is indicative of the content presentation times of the components, said client device further characterized by:
- 5 means for presenting the data according to player start times of the components based on the start-up delay and the content presentation times of the components.
24. The client device of claim 23, characterized in that the information is further indicative of content end times of the components, and the client device removes one or more components after presenting said one or more components based on the content presentation times and the content end times of the components.
- 10 25. A computer program for use in a server in a network, the network having at least a client, wherein the server is adapted to transmit to the client data having various content properties, so as to allow the client to download the data in a client buffer before presenting at least a part of the data, each component having a component size, said computer program characterized by:
- 15 a first code to determine the presentation times based on the component size and the content properties of the files; and
- a second code to generate information indicative of the presentation times, so as to allow the client to determine a start up delay in the presentation.
- 20 26. A computer program for use in a client in a network, the network having at least a server for transmitting to the client data having various content properties, so as to allow the client to download the data in a client buffer before presenting at least a part of the data, each component having a component size, wherein the server is adapted to transmit to the client information indicative of the content properties, said computer program characterized by:
- 25 a code to determine a start up delay in the presentation; and
- a code to determine player start times of the components based on the content properties and the start-up delay in the presentation.
- 30

Abstract

In progressive downloading of multimedia content, such as SVG files, the client buffers some data for a certain time so the content can be decoded and presented in a timely manner. In order for the client to start presenting the content of a file at an appropriate time, the client has to estimate the start-up delay time correctly. The server, prior to or at the time of sending the data, provides the client information indicative of content properties, such as the size and content presentation time of some or all scenes. The information may include transmission minimum bandwidth to ensure each remaining scene will be available before its presentation time. The client estimates the start-up delay time based on the provided information. Furthermore, the client can determine when to remove one or more files from its data buffer in order to minimize the memory usage.

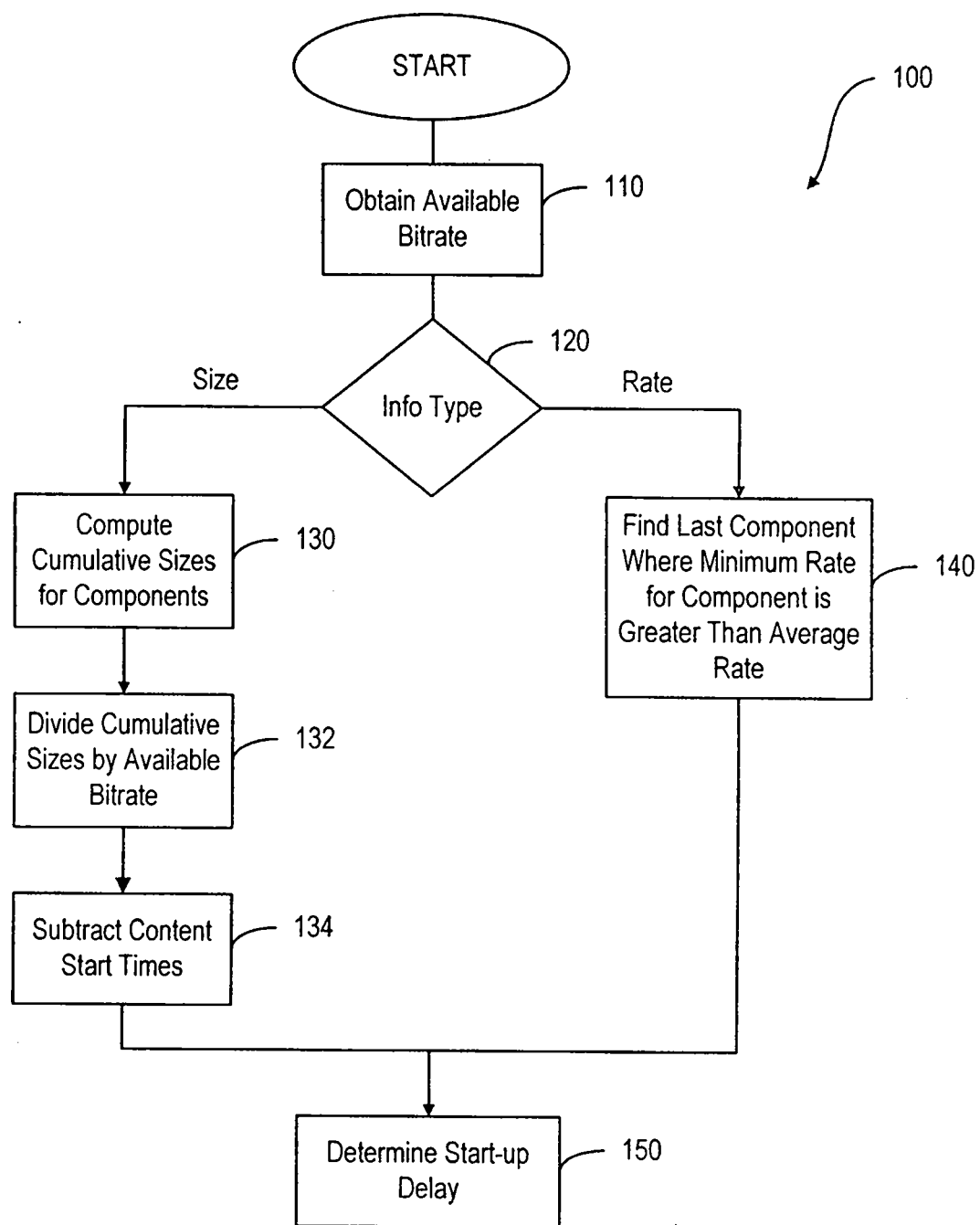


FIG. 2

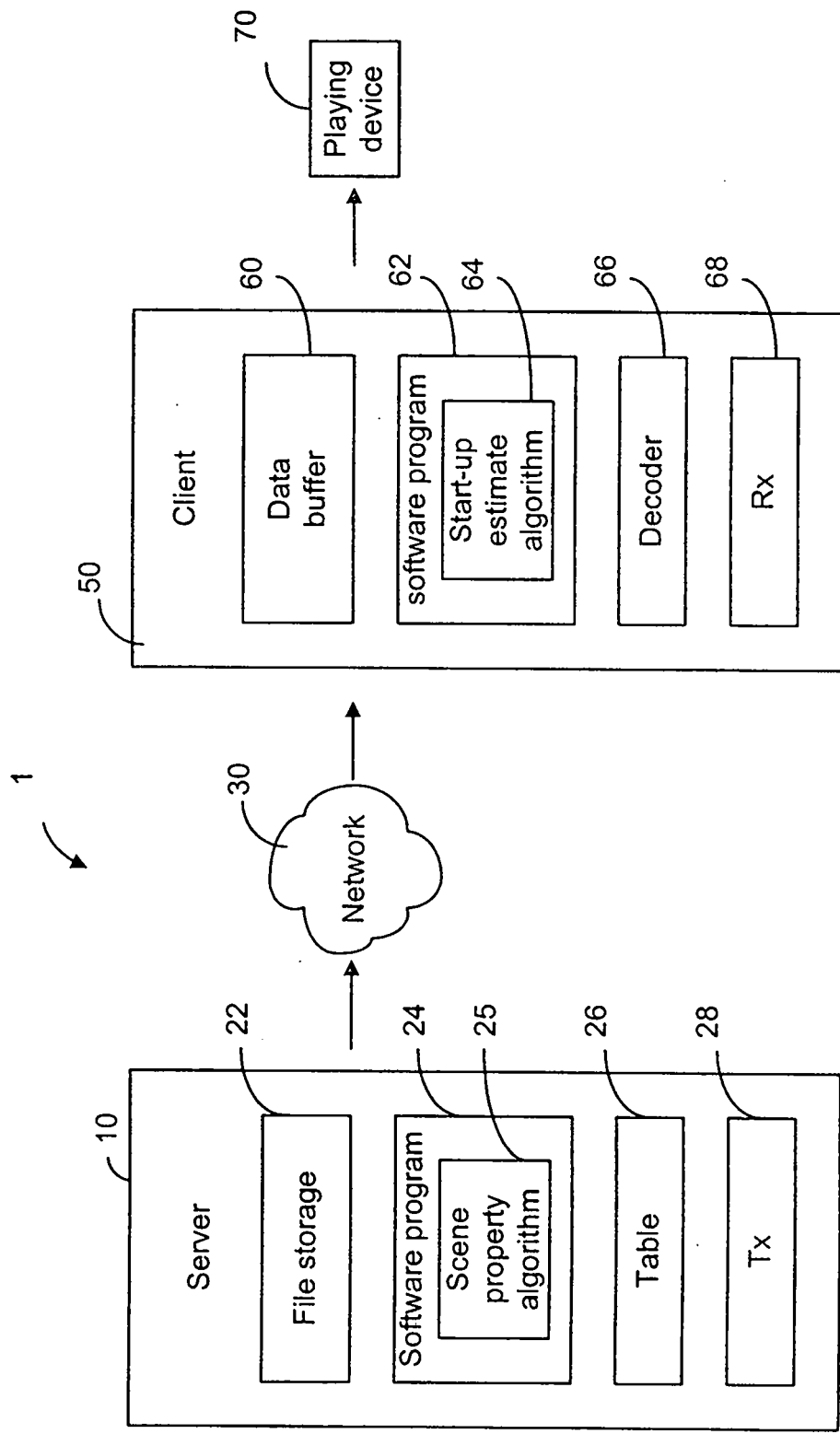


FIG. 1

NIT : 800176089-2

RECIBO OFICIAL DE CAJA : 04 - 47,576
FECHA : JUNIO 15 DE 2004

SUPERINDUSTRIA Y COMERCIO
Radicacion : 04062033 00000000 Folios: 31
Fecha (AMD): 2004-07-01 12:18:39
Tramite : 002 PATENTES D 1 REGISTRO/ 411 PRESENTA
Dependencia: 2020 DIVISION DE NUEVAS CREACIONES

***** CONSIGNACION *****

DEPOSITANTE	TIPO PAGO	BANCO	CUENTA	No. PAGO	FECHA PGO	Vr. PAGO
CAVELIER ABOGADOS	CONSIGNACION	BANCO POPULAR	050-00110-6	24740347	15/06/2004	43,837,560.00

***** C O N C E P T O *****

CANT.	RENTISTICO	CONCEPTO	TOTAL CONCEPTO
1	50005-01-01 SOLICITUDES	1 TRAMITES DE SOL. DE PATENTE DE IN	422,000.00
TOTAL :			\$ 422,000.00

SON: CUATROCIENTOS VEINTIDOS MIL PESOS

RESPONSABLE : _____

RECIBO DE CAJA APLICADO AL EXPEDIENTE No. _____

Colo 05995-801-001-5

SUPERINDUSTRIA Y COMERCIO
 Radicacion : 04063033 00000000 Folios: 31
 Fecha (AMD): 2004-07-01 17:18:39
 Trámite : 002 PATENTES D 1 REGISTRO/ 411 PRESENTAL
 Dependencia: 2020 DIVISION DE NUEVAS CREACIONES

NIT : 800176089-2

RECIBO OFICIAL DE CAJA : 04 - 43.126
 FECHA : JUNIO 1 DE 2004

***** CONSIGNACION *****

DEPOSITANTE	TIPO PAGO	BANCO	CUENTA	No. PAGO	FECHA PGO	Vr. PAGO
CAVELIER ABOGADOS	CONSIGNACION	BANCO POPULAR	050-00110-6	24340345	01/06/2004	39,669,000.00

***** CONCEPTO *****

CANT.	RENTISTICO	CONCEPTO	TOTAL CONCEPTO
1	50005-01-01	SOLICITUDES	
		82 INVOCACION DE UNA PRIORIDAD EN NU	118,000.00
TOTAL :			\$ 118,000.00

SON: CIENTO DIEZ Y OCHO MIL PESOS

RESPONSABLE : _____

RECIBO DE CAJA APLICADO AL EXPEDIENTE No. _____

060 05995-801-001-5

SUPERINDUSTRIA Y COMERCIO
 Radicacion : 04063033 00000000
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 Trámite : 002 PATENTES D
 Dependencia: 3620 DIVISION DE NUEVAS CREACIONES
 Folios: 31

NIT : 800176089-2

RECIBO OFICIAL DE CAJA : 04 - 25,946
 FECHA : MARZO 30 DE 2004

***** CONSIGNACION *****

DEPOSITANTE	TIPO PAGO	BANCO	CUENTA	No. PAGO	FECHA PGO	Vr. PAGO
CAVELIER ABOGADOS	CONSIGNACION	BANCO POPULAR	050-00110-2	22156874	30/03/2004	42,288,000.00

***** CONCEPTO *****

CANT.	RENTISTICO	CONCEPTO	TOTAL CONCEPTO
1	50005-01-01	SOLICITUDES	
		82 INVOCACION DE UNA PRIORIDAD EN NU	118,000.00
TOTAL :			\$ 118,000.00

SON: CIENTO DIEZ Y OCHO MIL PESOS

RESPONSABLE : _____

RECIBO DE CAJA APLICADO AL EXPEDIENTE No. _____

Colo 05995-801-001-5

32

SUPERINDUSTRIA Y COMERCIO
Radicacion : 04063033 00000000 Folios: 31
Fecha (AMD): 2004-07-01 17:18:39
Tramite : 002 PATENTES D 1 REGISTRO/ 411 PRESENTA
Dependencia: 2020 DIVISION DE NUEVAS CREACIONES

REQUISITOS NECESARIOS PARA PRESENTACION Y AGILIZACION DEL TRAMITE

	USUARIO	RADICADOR
PATENTE DE INVENCION	()	(X)
MODELO DE UTILIDAD	()	(X)
- Indicación de que se solicita la concesión de una patente.	()	(X)
- Datos de identificación del solicitante o de la persona que se presenta la solicitud.	()	(X)
- Descripción de la invención.	()	(X)
- Dibujos de ser estos pertinentes.	()	(X)
- Comprobante de Pago de las tasas establecidas.	()	(X)
COMPLETA ()	INCOMPLETA ()	()
DISEÑO INDUSTRIAL ()		
- Indicación de que se solicita el registro de Diseño Industrial	()	()
- Datos de identificación del solicitante o de la persona que presenta la solicitud.	()	()
- Representación gráfica o fotográfica del Diseño Industrial o muestra del Material que incorpora el diseño.	()	()
- Comprobante de pago de las tasas establecidas	()	()
COMPLETA ()	INCOMPLETA ()	()
ESQUEMA DE TRAZADO ()		
- Indicación de que solicita el registro de un Esquema de trazado.	()	()
- Datos de Identificación del solcitante o de la persona que presenta La solicitud.	()	()
- Representación gráfica del esquema de trazado	()	()
- Comprobante de pago de las tasas establecidas.	()	()
COMPLETA ()	INCOMPLETA ()	()

Firma Responsable: Claudia M Nueva

Fecha:

2020
Bogotá, D. C.

Doctor(a)
EMILIO FERRERO
Apoderado(a)

Oficio No. 07754

REFERENCIA:

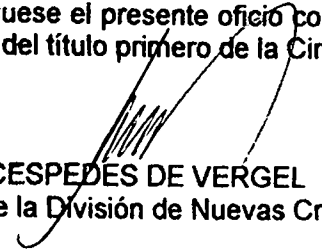
Radicación	04-63033
Trámite	002
Evento	001
Actuación	430
Folios	001

Como resultado del examen de forma, realizado con fundamento en el artículo 38 de la Decisión 486 de la Comisión de la Comunidad Andina, se le comunica que:

- Allegar copia del documento en que conste la cesión del derecho a la patente otorgado por los inventores al solicitante o a su causante (art. 26-k, Dec 486/2000).
- Debe aportar la traducción de la solicitud presentada como solicitud colombiana.

En cumplimiento del artículo 39 de la Decisión 486, se le requiere para que dentro del término de dos (2) meses siguientes a la fecha de notificación del presente oficio, complete los requisitos anteriormente enunciados. En caso de no dar cumplimiento al presente requerimiento, la solicitud se considerará abandonada y perderá su prelación.

Notifíquese el presente oficio conforme a lo dispuesto en el numeral 5.2, literal e), del capítulo quinto del título primero de la Circular Unica No.10 de 2001.


ALIX CESPEDES DE VERGEL
Jefe de la División de Nuevas Creaciones

El anterior requerimiento fue notificado por fijación en lista de fecha

19 AGO. 2004

Se recuerda al interesado que debe presentar, dentro de los dieciséis meses siguientes contados a partir de la fecha de presentación de la solicitud cuyas prioridades se invocan, copia de las mismas certificadas por la autoridad que las expidieron y, en los casos en que haya lugar, las traducciones simples del capítulo reivindicatorio. El incumplimiento de éste plazo, acarreará la pérdida de la prioridad invocada.