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PF/i Report Number **2006426-5499050**

TOTAL PATENT FACTOR": 750/1000

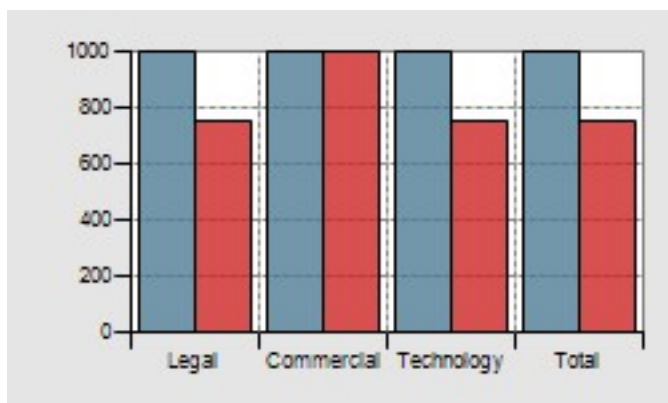
www.PatentCafe.com Analytics

Patent Number: **US 5499050**

Patent Title: **Method and apparatus for monitoring video compression processing**

PATENT FACTOR" INDEX REPORT

This **Patent Factor" Index Report** separately analyzes the three critical factors that professional analysts need to determine patent value, to make legal assessments, or to support business-critical decisions relating to this patent. High confidence strategies and real-world valuation occurs when Legal, Commercial, and Technology Factors are assessed with the understanding of how each factor interrelates with the others.



More emphasis should be placed on the individual factor indices rather than the Total Patent Factor since a single "score" may obfuscate important components contributing to patent value from the Recipient's unique objectives, perspective, core knowledge, assumptions or understanding of the discrete legal, technology or commercial indicators reviewed in this report.

The Patent Factor Index Report is the industry's most significant and comprehensive online patent analysis tool, providing a window of understanding into the patent being evaluated based on advanced latent semantic analysis technology and large scale patent analytics modeling (multivariate regression models, econometric, citation and bibliometric analysis).

Each FACTOR may earn a maximum index of 1000, and a minimum index of ZERO. This Summary Page is followed by individual factor analysis, further detailed by accompanying notes and references.

PATENT FACTOR" INDEX SUMMARY

Remaining Life of Patent: **7 Years 7 Months**

Patent Legal Factor (PL/f): 750/1000

This patent appears to have a very good legal factor index compared to closely related patents compared in this report. This rating suggests that there are some legal elements of this patent that are unfavorable, and may affect the enforceability, value, and anticipated commercialization strategy. Review legal factor indices.

Patent Commercial Factor (PC/f): 1000/1000

This patent may have excellent commercialization potential, including a disproportionately high valuation compared to the most closely related patents. Other related patents owned by the same applicant as listed in this report may present a similar favorable commercialization opportunity. Review commercial factor indices.

Patent Technology Factor (PT/f): 750/1000

This patent appears to protect a very good technology. Certain components of this technology will be more important than others in meeting certain financial, business or legal objectives. Review the individual technical factor indices to determine the negative indices that prevented this patent from receiving a higher rating.

REPORT CONTENTS

Section 1: [Patent Bibliography](#)

Section 2: [Patent Legal Factor \(PL/I\)](#)

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www.PatentCafe.com Analytics; PF/i Report Number 2006426-5499050

PATENT BIBLIOGRAPHIC DATA

Patent Number: 5499050

Document Kind: A1

Patent Title:

Method and apparatus for monitoring video compression processing

Named Inventors:

Baldes, Gary C.

-Echols, Ben

-Kasai, Arlene

Applicants (Assignees):

Intel Corporation

Agents:

Mendelsohn; SteveMurray; William H.

Filing Date:

11/1/1993

Issue/Pub Date:

3/12/1996

Patent Termination:

Expires: 11/1/2013

Patent Enforceability Status:

Enforceable

US Classifications / Sub Classes:

348 / 180

348 / 384

IPC Classifications / Sub Classes:

H04N / 007/12

H04N / 017/00

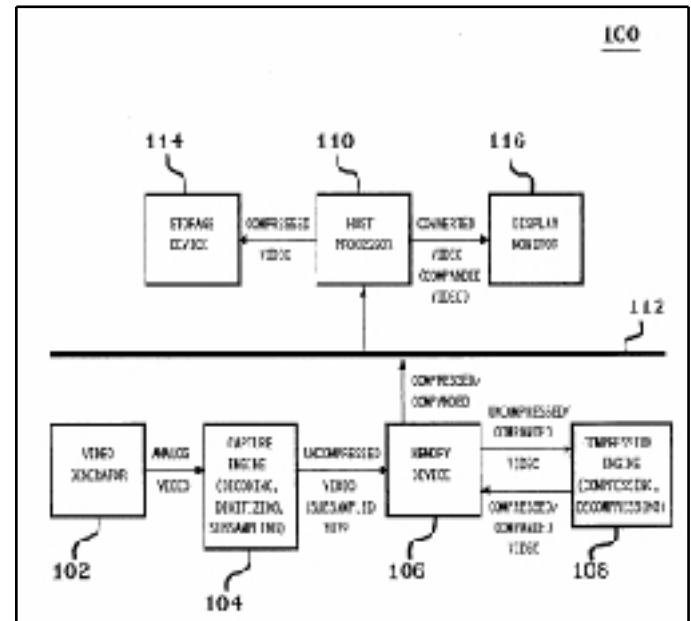
Jump forward to: [Citations](#)

Abstract:

A method and apparatus for providing accurate, real-time monitoring of image compression processing. Video data is compressed by a microprocessor running a video compression algorithm. A product of this compression process is a decompressed (i.e., companded) image to be used in the compression of the next video image. This companded image is also used by the video capture system for display for real-time monitoring of video compression processing. In a preferred embodiment, every video frame that is compressed, is also displayed in real-time on a display monitor.

Patent Family Information:

US 5499050A 03/12/1996 Enforceable



PATENT LEGAL FACTOR (PL/f)



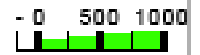
1. ENFORCEABILITY

A US patent has three maintenance fee payment dates between issuance and expiration. Failure to pay maintenance fees, or expiration results in an unenforceable patent. If a patent is in review, the enforceability rating is reduced since there is a chance the patent will be invalidated.



2. TOTAL RELEVANCY STRENGTH

Relevancy ranking of this patent compared to the 100 most relevant US patents returned from a Latent Semantic Analysis search using the full text claims of this patent.



3. NOVELTY

Based on backward patent citations. A higher number of backward citations generally indicates a reduction of invention novelty. This indicator shows the placement in number of backward citations compared to the 100 most relevant patents.



4. CLAIM SCOPE BREADTH

Patents containing a higher number of backward patent and non-patent citations have been shown to have a narrower scope of claims (more limitations) than related patents with fewer citations.



5. VALIDITY CONFIDENCE (Un-cited Earlier Filed Art)

A lower number of highly relevant but un-cited patents with earlier filing dates, disregarding earlier prior art *issue* dates, increases the confidence of surviving an invalidity challenge.



6. VALIDITY CONFIDENCE (Un-cited Concurrent Art)

Discovery of fewer highly relevant but un-cited Concurrent art patents (co-pending during prosecution) increase the confidence of surviving an invalidity or infringement challenge.



7. SUSTAINABILITY IN OPPOSITION

The number of inventors on a patent significantly correlates to opposition survivability; the fewer inventors, the more likely a patent is to survive opposition.



8. LITIGATION AVOIDANCE

When compared to closely related patents, if this patent has fewer forward citations within 3 years of issuance, it will substantially increase likelihood of avoiding future litigation.



9. TABLE 1.0 - KEY LEGAL INDEX METRICS

Patent Expiration Date (calculated):	11/1/2013
Number of Backward Patent and Non-patent Citations:	6
Number of Relevant Un-cited Prior Art Patents:	0
Number of Relevant Un-cited Concurrent Art Patents:	0
Number of Forward Citations (within 3 yrs post issuance):	18

10. [[About This Report](#) | [Definitions](#) | [Related Tables & Charts](#) | [References](#)]

Notes. Patent Legal Factor (PL/f)

- 1. Enforceability:** The actual patent term may be different from the patent term shown if there were any patent term adjustments made under 35 USC § 1.705.
- 2. Relevancy:** Higher ranked patents are more relevant to the claims of this patent, based on PatentCafe's Latent Semantic Analysis search results.
- 3. Novelty:** More prior art citations limit the scope of the inventor's claim for novelty since the patent builds previous innovations or preexisting knowledge. Statistically, non-patent citations restrict novelty more than patent citations.
- 4. Claim Scope:** Patents containing a higher number of backward citations have narrower claim scope. This is offset on patents that have a correspondingly higher number of claims. This report does not adjust scope based on the number of claims..
- 5. Validity:** (Table A) Evidence in various patent litigation studies suggests that un-cited prior art is the most common basis for court decisions invalidating U.S. patents.
- 6. Concurrent Art:** (Table A) Concurrent art citations represent a high risk to a patent since there was no way for the Applicant, or possibly the patent examiner, to know the disclosure or claims contained in the Concurrent Art citations.
- 7. Opposition:** only the number of inventors is significantly correlated with the maintenance of the patent but exerts a negative effect on the likelihood of the patent surviving opposition.
- 8. Litigation Avoidance:** Compared to relevant patents, one additional forward citation per claim raises the probability of an infringement suit by 22 percent. A one standard deviation increase in forward citations per claim raises the probability of litigation by 35 percent.

Patent Prior Art Citations for Patent No: US 5499050

TABLE A

Backward Citations	Forward Citations	UN-cited Prior Art	UN-cited Concurrent Art
US: 4942479	US: 5920340		
US: 4953019	US: 5574500		
US: 5051827	US: 5798788		
US: 5081450	US: 5883670		
US: 5097518	US: 6008802		
US: 5313280	US: 6091778		
	US: 6105083		
	US: 6118923		
	US: 6295083		
	US: 6327634		
	US: 6357047		
	US: 5654751		
	US: 6363116		
	US: 6816628		
	US: 6437829		
	US: 6879720		
	US: 6892391		
	US: 6978053		

PATENT COMMERCIAL FACTOR (PC/f)



11. FORWARD CITATION VALUE CONTRIBUTION

A larger number of forward citations when compared to the 100 most closely related patents disproportionately increases the value of this patent.



12. BACKWARD CITATION VALUE CONTRIBUTION

The larger number of backward patent citations tend to suggest a larger market size. Backward citations are a less reliable contributor to patent value than Forward Cites.



13. ENFORCEMENT LICENSING POTENTIAL

Fewer applicants dominating a particular field present a more favorable environment to pursue more costly opportunities to generate the highest revenue per licensee.



14. PARTNERING LICENSING POTENTIAL (CROSS-CLASSIFICATION)

Licensing potential into non-obvious or unrelated patent classes is based on invention activity in closely-related markets protected by different US classifications.



15. CROWDEDNESS (POTENTIAL LICENSEES)

Crowdedness (more assignees practicing highly related patents that are within the top 100 most relevant) suggests more activity in the market, and more licensing opportunities.



16. DIVESTITURE LICENSING PREMIUM (PATENT GROUP)

Broader market protection corresponds to the increased number of patents, and value of each patent this applicant owns (*Patent Group*) within the 100 most relevant.



17. PATENT GROUP COMPETITIVE POSITION

The competitive position of this applicant's Patent Group relative to the size of other applicants' Patent Groups identified within the 100 most relevant patents.



18. IN-LICENSE OPPORTUNITY

For portfolio expansion through in-licensing: this index rates the relative number of *high interest, unassigned* enforceable patents within the 100 most relevant.



19.

TABLE 2.0 - KEY COMMERCIAL INDEX METRICS

Number of Different US Classes Within 100 Most Relevant Patents:	15
Potential Licensees (Applicants) Within 100 Most Relevant Patents:	45
Number of Unassigned Patents Within Top 100 (Informational):	30
Number of Patents Owned by This Applicant Within Top 100 (Patent Group):	7

20. [[About This Report](#) | [Definitions](#) | [Related Tables & Charts](#) | [References](#)]

Notes. Patent Commercial Factor (PL/f)

11. Forward Citation Value: Compared to relevant patents within this semantic technology area, each extra citation per patent boosts market value by 3%. Patents with two to three times the median number of forward citations carry a 35% value premium, and those with 20 citations and more command a 54% market value premium. The factor bar indicates how this patent compares to the 100 most relevant in this technology area. (Patent Applications rarely have forward citations.)

13. Enforcement Licensing: A higher enforcement (stick) licensing potential is shown when fewer applicants dominate this field, assuming that higher costs of aggressive litigation correspond to higher long-term revenue potential. Interpret this factor bar IN THE INVERSE if the objective is to broadly assert this patent against many smaller licensees who would see licensing as an annoying but affordable alternative to litigation.

14. Partnering Licensing: (TABLE B) Combinatorial accession, or parallel inventions that exist outside of the US classification of this patent can present unanticipated licensing opportunities into non-obvious patent classifications. The Patent Factor identifies non-obvious patent classifications of closely related patents (based on semantic analysis of the claims of this patent).

15. Crowdedness: (TABLE C) A listing of potential licensees (applicants owning closely related patents).

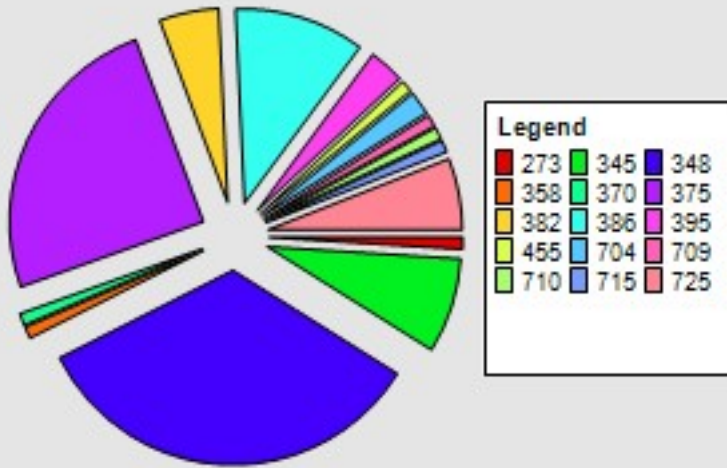
16. Divestiture Licensing: A negative factor rating (red) means that this applicant only owns one patent listed in the most relevant 100, although ownership of more patents that may not appear in the top 100 may also increase the discrete value of this patent, especially if this patent is included in a licensing bundle.

18. In-licensing Opportunity: (TABLE D) In-licensing potential is NOT incorporated into the PC/f scoring total which only focuses on out-licensing.

PC/f: Licensing Analysis

- Semantic search results may list related patents across seemingly unrelated US classifications. Patents categorized in such cross-classifications may have been misclassified, may disclose multiple inventions in different classes, or may reflect a diffusion of this technology into other technology areas.
- Your subject matter expertise is important in determining whether prolific applicants are inclined to respond negatively or positively to a "carrot" licensing offer. On the other hand, companies recently entering this technology area with products reading on just a few patents may be more amenable to licensing your technology.

Licensing Potential: Relevant Classifications



Non-obvious Classifications: TABLE B

The top 100 most relevant patents returned from the semantic search of the claims of patent 5499050 may indicate closely related patents in different US classifications. These non-obvious classifications often represent licensing opportunities not previously considered.

US Classifications

# Patents	US Classification
1	273
8	345
34	348
1	358
1	370
25	375
5	382
11	386
3	395
1	455
2	704
1	709
1	710
1	715
6	725

Field of Potential Licensees

Identifying Licensees: Table C

# Patents	Applicant Name
2	ATI International SRL
1	ATI International, SRL
5	ATI Technologies, Inc.
2	Avid Technology, Inc.
1	Bally Manufacturing Corporation
2	Broadcom Corporation
1	C-Cube Microsystems, Inc.
1	C-Cube Semiconductor II, Inc.
2	Cirrus Logic, Inc.
1	DIVA Systems Corporation
1	Divio, Inc.
1	Electronics and Telecommunications Research Institute
1	Funai Electric Co., Ltd.

Companies (applicants) named on the 100 patents most relevant to patent 5499050 have an interest in your product or technology area. Applicants with multiple patents listed within the top 100 have invested heavily in this area, and consider this technology segment to be of high commercial interest.

Prolific applicants within this technology / product area may prefer litigation to licensing, while smaller applicants may welcome the opportunity to in-license to fortify their smaller portfolio.

2	General Instrument Corporation
1	General Instrument Corporation of Delaware
1	Harman Becker Automotive Systems GmbH
1	Hitachi, Ltd.
1	ICTV, Inc.
1	International Business Machines Corporation
2	Koninklijke Philips Electronics N.V.
3	LG Electronics Inc.
1	LSI Logic Corporation
1	Matsushita Electric Industrial Co., Ltd.
1	MEDIA TEK INC.
1	Minerva Systems, Inc.
1	Mitsubishi Semiconductor America, Inc.
1	Motorola, Inc.
1	NuCORE Technology Inc.
1	PIONEER TECHNOLOGY UNITED KINGDOM LTD
1	Quantel Limited
5	Samsung
1	Sarnoff Corporation
1	SGS-Thomson Microelectronics S.r.l.
1	Sony Corporation
3	STMicroelectronics, Inc.
2	Sunplus Technology Co. Ltd.
1	Texas Instruments Incorporated
1	Thomson Consumer Electronics, Inc.,
2	Thomson Licensing S.A.
1	Toko, Inc.
1	United Microelectronics Corp.
1	Via Technologies, Inc.
2	Winbond Electronics Corp.

In-licensing / Opportunistic Licensing

Unassigned Patents : TABLE D

Patent Number

Patent Number

The most relevant unassigned patents represent an opportunity for a company practicing in this technology area to expand its portfolio by in-licensing.

Patents are recorded without an assignee (applicant) name for various reasons, including a decision by the applicant to not record the assignment, or because there was no separate legal entity (other than the inventor) to hold the rights for this patent.

PATENT TECHNOLOGY FACTOR (PT/f)



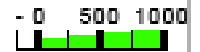
21. TECHNOLOGY ADVANCEMENT

This patent factor bar indicates whether this patent is a small incremental step, or a significant leap over the technology disclosed in the 100 most closely related patents.



22. TECHNICAL SOPHISTICATION

A higher number of forward citations to this patent, when compared to the 100 most relevant patents, indicates a higher level of technical sophistication.



23. COMBINATORIAL ACCESSION

The higher the number of primary classifications within the top 100 most relevant that differ from the present invention, the more diffused the core technology is.



24. TECHNOLOGY COGENCY

More inventors listed on the present patent, when compared to the 100 most relevant patents, argue in favor of a stronger, more substantial and persistent technology (cogency).



25.

TABLE 3.0 - KEY TECHNOLOGY FACTOR METRICS

Number of Different US Classes of Forward Cited Patents:	24
Number of Inventors Listed in This Patent:	3

26. [[About This Report](#) | [Definitions](#) | [Related Tables & Charts](#) | [References](#)]

Notes. Patent Technical Factor (PT/f)

21. Technology Advancement: An increased number of backward citations, when compared to closely related patents, generally indicates that the current patent is more closely linked to previous innovations or pre-existing knowledge upon which the inventor builds (smaller technology advancement). An exception occurs when a correspondingly high number of claims support the larger number of backward citations. This report does not adjust for claims count.

22. Technical Sophistication: Technical sophistication is operationalized by forward citations. The number of forward citations a patent receives correlates positively with its technological importance, as measured by expert opinions, social value, and industry awards, as well as to an increased economic value of the invention.

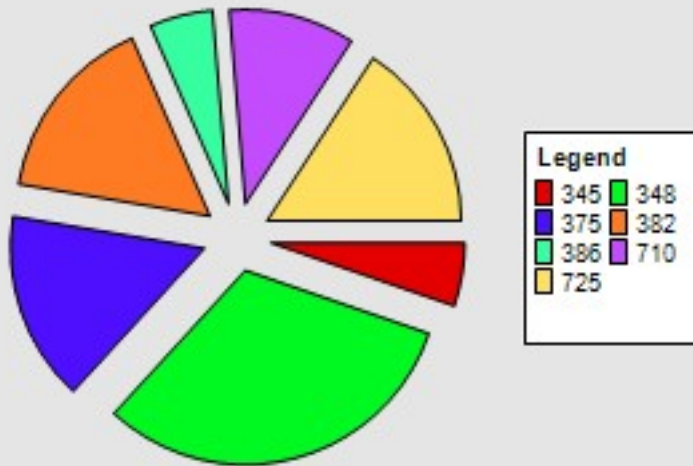
23. Combinatorial Accession: (TABLE E.) A higher combinatorial accession occurs when there are a high number of classifications different from the primary US classification of the present patent. However, in some cases a number of different US classifications of the 100 most relevant patents may still be within the core technology area. Be sure to review the classification diversity in the table below.

24. Technology Cogency: When more inventors contribute to an invention, it tends to be "more complete". If this patent has more inventors listed when compared to the mean number of inventors on closely related patents, it will generally be a stronger, more important technology. This may not be all positive, since the larger number of inventors also reduces the likelihood that the patent will survive opposition (#7).

PT/f: Combinatorial Accession

- A high rate of adoption of the core technology protected by this patent by unrelated industry segments reinforces the importance of the this technology.
- The 100 most relevant patents are analyzed, and unobvious patent classifications linked to the core technology are identified. Each classification is assumed to represent a different "industry segment".
- If the present patent enjoys an earlier filing date, the spill-over represented by other classifications is the Combinatorial Accession of this patent. If other closely related patents were earlier filed, the present patent may reflect the adoption of the underlying technology from another industry segment.

Combinatorial Accession



Diffusion of Classifications: TABLE E

The 100 most relevant patents are categorized in the following primary US classifications. Classifications that differ from the present patent indicate a diffusion of this patent's technology into other technology areas.

US Classifications

# Patents	US Classification
1	345
6	348
3	375
3	382
1	386
2	710
3	725

PT/f: Technology Adoption / Diffusion (S-Curve)

S-curves represent the generational improvements in technology within this area over time, and at what point a particular technology enters the curve. The curves are used to visualize (a) the probable useful life of a patent (based on the number of generations of improvement since the issuance of this patent), and (b) the adoption of this technology by other industry areas, or the diffusion of technology to spawn related innovation.

The value of this patent is tied positively to a number of S-curve factors: Higher value technologies appear closer to the front of a new S-curve, and the steeper, longer curves indicate a larger market. A dispositive factor is the appearance of many generations of technology improvement (more discrete S-curves) since this patent appeared; this may indicate a a more rapid obsolescence (shorter useful life) of that patent's technology.

- S-Curve charts below show the number of related patents (gold line) occurring within each year (X Axis).
- The green triangles show the issue and filing year of patent 5499050 in relation to all other patents in the series.
- The dashed line "S-Curve" is the geometric mean average of patent activity occurring during the series years.
- A decline in the number of patents in the most recent years may indicate either:
 - (a) an actual decline in patent activity within this technology area,
 - (b) a delay in public notification (not yet issued or published), or
 - (c) the assignment of this technology to a new patent classification (i.e., reclassification) not tracked by this report.

100 Patents Most Relevant to Patent 5499050



About S-Curve: TABLE F

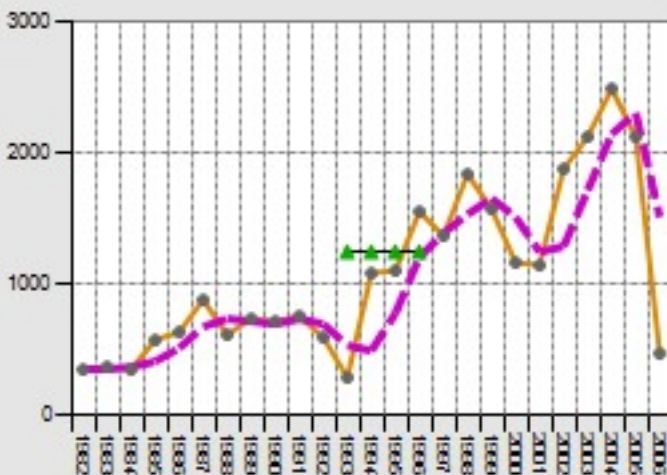
This S-Curve plots the 100 patents most closely related to patent 5499050 based on the Semantic search of the claims of this patent, regardless of US patent class.

The most relevant patents may have been issued in US patent classifications *different from* the classification of this patent, indicating the possible diffusion of this technology across various product or industry sectors.

The date range (X axis) is from the earliest to latest issue date of the 100 most relevant patents.

Any year not shown means that none of the 100 most relevant patents were issued during that year.

25 Year Trend, Year Issued, USC 348



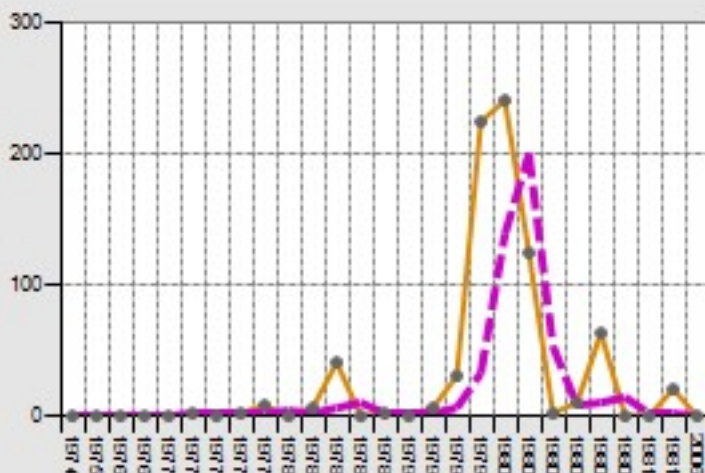
About S-Curve: TABLE G

Seminal patents within a US patent classification typically occur at the steepest transition between the "long flat tail" and the rapid rise in the curve.

If patent 5499050 is closer to the Front of an S-Curve, it is considered to be a more important technology upon which rapid improvement or subsequent diffusion is based.

A sequence of individual S-Curves indicates a succession of noticeable improvements in this technology area - know as "technology generations". The technological importance and economic value of this patent may diminish with each subsequent generation since it issued, regardless of where it resides on the S-Curve within its own generation.

25 Year Trend, Year Filed, USC 348



About S-Curve: TABLE H

Beginning in 2001, patent applications (dotted line) are published 18 months after initial filing whether they have issued or not. They serve as an "early predictor" of the issued patent S-Curve above.

A rapid rise in the patent application activity may be an early indicator that a vigorous period of technology diffusion or adoption may be imminent.

Do not simply assume that a rapid decline in the most recent 1-1/2 years means a tapering off of activity within this classification. Because of the 18 month publication rule, many pending patents may not be reflected on this chart. Verify new patent application activity every few months.

Latent Semantic Search Results List

27. Following is the list of the 100 most relevant patents used in generating this PF/i Report.

Rank	Document	Applicant	Filing/Issue Dates	Patent Title
100%	US 05499050	Intel Corporation	11/01/1993 - 03/12/1996	Method and apparatus for monitoring video compression processing
84%	US 05854892	Intel Corporation	05/03/1996 - 12/29/1998	Video conferencing decoder engine with direct signaling to encoder engine for relaying of decoded
84%	US 06389174	Intel Corporation	05/03/1996 - 05/14/2002	Video transcoding with interim encoding format
82%	US 05845083	Mitsubishi Semiconductor America, Inc.	03/07/1996 - 12/01/1998	MPEG encoding and decoding system for multimedia applications
82%	US 05970233	Intel Corporation	05/06/1996 - 10/19/1999	Multiple codecs for video encoding format compatibility
82%	US 20050212784	Sunplus Technology Co. Ltd.	02/11/2005 - 09/29/2005	Liquid crystal display system with a storage capability
81%	US 05577191	Minerva Systems, Inc.	02/17/1994 - 11/19/1996	System and method for digital video editing and publishing, using intraframe-only video data in inte
81%	US 20050226320	Koninklijke Philips Electronics N.V.	10/19/2004 - 10/13/2005	Circuit, apparatus and method for storing audiovisual data
81%	US 06567127	ATI International SRL	10/08/1999 - 05/20/2003	Method and apparatus for enhanced video encoding
80%	US 20040168205	Not Assigned	11/12/2003 - 08/26/2004	Content analysis apparatus
80%	US 05923665	Cirrus Logic, Inc.	09/19/1997 - 07/13/1999	Memory controller for decoding a compressed/encoded video data frame
80%	US 6975324	Broadcom Corporation	08/18/2000 - 12/13/2005	Video and graphics system with a video transport processor
80%	US 20030121038	Not Assigned	12/11/2002 - 06/26/2003	Caching system and method supporting improved trick mode performance in video decoding systems
80%	US 20050074066	PIONEER TECHNOLOGY UNITED KINGDOM LTD	08/27/2004 - 04/07/2005	Digital television signal decoder
80%	US 05838380	Cirrus Logic, Inc.	12/23/1994 - 11/17/1998	Memory controller for decoding a compressed/encoded video data frame
80%	US 06115072	Motorola, Inc.	01/27/1999 - 09/05/2000	16:9 aspect ratio conversion by letterbox method for an MPEG image
80%	US 20050162555	Sunplus Technology Co. Ltd.	10/26/2004 - 07/28/2005	Digital photo frame device
80%	US 05923375	SGS-Thomson Microelectronics S.r.l.	02/13/1997 - 07/13/1999	Memory reduction in the MPEG-2 main profile main level decoder
79%	US 20030202606	Not Assigned	01/27/2003 - 10/30/2003	Multi-phase processing for real-time display of a compressed video bitstream
79%	US 20020071663	Not Assigned	12/07/2000 - 06/13/2002	Digital video recording system having multi-pass video processing
79%	US 20040146207	Not Assigned	01/16/2004 - 07/29/2004	Electronic apparatus generating video signals and process for generating video signals
79%	US 20060038921	Not Assigned	08/17/2005 - 02/23/2006	VIDEO DATA PROCESSING METHOD AND APPARATUS CAPABLE OF SAVING BANDWIDTH
79%	US 6961384	General Instrument Corporation	12/14/2000 - 11/01/2005	Still picture processing for MPEG-2 video
79%	US 06356662	Winbond Electronics Corp.	03/02/1999 - 03/12/2002	Method of efficiently handling digitized data through compression/decompression and utilization
79%	US 20050249483	STMicroelectronics, Inc.	08/28/2003 - 11/10/2005	Method for processing audio/video data within an audio/video disk drive, and corresponding drive
79%	US 20020075399	Not Assigned	12/14/2000 - 06/20/2002	Still picture processing for MPEG-2 video
79%	US 20040136697	Not Assigned	12/23/2003 - 07/15/2004	Apparatus and method for recording multimedia data with high efficiency
79%	US 20030118116	Not Assigned	12/11/2002 - 06/26/2003	Command packet system and method supporting improved trick mode performance in video decoding system
79%	US 05548324	Intel Corporation	05/16/1994 - 08/20/1996	Process, apparatus and system for displaying multiple video

				streams using linked control blocks
79%	US 20030121044	Not Assigned	12/11/2002 - 06/26/2003	System and method for enhancing performance of personal video recording (PVR) functions on hits digi
79%	US 06005621	C-Cube Microsystems, Inc.	07/22/1997 - 12/21/1999	Multiple resolution video compression
79%	US 06259740	LG Electronics Inc.	08/28/1998 - 07/10/2001	Moving picture experts group video decoding apparatus and method for supporting replay
78%	US 20040258160	Not Assigned	06/20/2003 - 12/23/2004	System, method, and apparatus for decoupling video decoder and display engine
78%	US 06229850	C-Cube Semiconductor II, Inc.	10/19/1999 - 05/08/2001	Multiple resolution video compression
78%	US 20050212969	Via Technologies, Inc.	03/23/2005 - 09/29/2005	Apparatus and method of image display with real-time compression
78%	US 06337880	Avid Technology, Inc.	04/07/2000 - 01/08/2002	Indexing for motion video that is compressed using interframe and intraframe techniques
78%	US 05727112	Quantel Limited	01/06/1995 - 03/10/1998	Video processing apparatus and method
78%	US 05969770	Thomson Consumer Electronics, Inc.,	05/17/1996 - 10/19/1999	Animated "on-screen" display provisions for an MPEG video signal processing system
78%	US 06339760	Hitachi, Ltd.	04/27/1999 - 01/15/2002	Method and system for synchronization of decoded audio and video by adding dummy data to compressed
78%	US 20040264803	Not Assigned	06/30/2003 - 12/30/2004	Method for transcoding MPEG encoded streams
78%	US 20050074063	Not Assigned	09/15/2003 - 04/07/2005	Resource-adaptive management of video storage
78%	US 06020924	Samsung	04/12/1996 - 02/01/2000	Reduced memory size set top box which stores frames and associated motion vectors which indicate whi
78%	US 20040076235	MEDIA TEK INC.	10/14/2003 - 04/22/2004	Method and an apparatus for reordering a decoded picture sequence using virtual picture
78%	US 06297843	Intel Corporation	09/30/1993 - 10/02/2001	System providing video compression/encoding for communications across a network
78%	US 06151074	Texas Instruments Incorporated	09/30/1997 - 11/21/2000	Integrated MPEG decoder and image resizer for SLM-based digital display system
78%	US 05717461	General Instrument Corporation of Delaware	07/11/1996 - 02/10/1998	Dram mapping for a digital video decompression processor
78%	US 20020067506	Not Assigned	11/26/2001 - 06/06/2002	Image compression device and method
78%	US 20040141553	Not Assigned	06/26/2003 - 07/22/2004	Buffer descriptor data structure for communication link between decode and display processes in MPE
77%	US 06765625	Divio, Inc.	06/16/2000 - 07/20/2004	Method and apparatus for bit-shuffling video data
77%	US 05629740	Toko, Inc.	08/18/1995 - 05/13/1997	Video transmitter for effecting after-recording
77%	US 20060038922	Not Assigned	08/18/2005 - 02/23/2006	VIDEO DATA PROCESSING METHOD AND APPARATUS CAPABLE OF SAVING BANDWIDTH
77%	US 20060018634	Broadcom Corporation	06/10/2005 - 01/26/2006	Creating a DVD compliant stream directly from encoder hardware
77%	US 20020103652	Harman Becker Automotive Systems GmbH	11/26/2001 - 08/01/2002	Decoding device, decoding method and automobile audio system with such a decoding device
77%	US 20030113093	Not Assigned	12/14/2001 - 06/19/2003	Method and system for generating a user interface for digital televisions
77%	US 04799677	Bally Manufacturing Corporation	02/24/1986 - 01/24/1989	Video game having video disk read only memory
77%	US 06741654	STMicroelectronics, Inc.	11/02/2000 - 05/25/2004	MPEG decoding circuit displaying images and incusted images
77%	US 20050122430	Samsung	10/29/2004 - 06/09/2005	Image storing/replaying apparatus and method therefor
77%	US 05940072	Samsung	08/15/1996 - 08/17/1999	Graphics decompression using system ROM indexing in TV set top box
77%	US 20040156434	Not Assigned	02/03/2004 - 08/12/2004	Hits stream rewind
77%	US 06327305	ATI Technologies, Inc.	04/22/1998 - 12/04/2001	Method and apparatus for encoding a stream of data blocks
77%	US 06519286	ATI Technologies, Inc.	04/22/1998 - 02/11/2003	Method and apparatus for decoding a stream of data
77%	US 20050086591	Not Assigned	06/26/2003 - 04/21/2005	System, method, and apparatus for annotating compressed

frames

77%	US 05594507	ICTV, Inc.	05/27/1994 - 01/14/1997	Compressed digital overlay controller and method for MPEG type video signal
77%	US 06351292	Thomson Licensing S.A.	10/16/1996 - 02/26/2002	Apparatus and method for generating on-screen-display messages using line doubling
77%	US 06678465	ATI International, SRL	06/18/1999 - 01/13/2004	Method and apparatus for restricting a video output of a computing system based on copy protection
77%	US 20020024997	Not Assigned	12/15/2000 - 02/28/2002	Data storing device and method
77%	US 20010009446	Not Assigned	03/07/2001 - 07/26/2001	Editing system with router for connection to HDTV circuitry
77%	US 20060002683	Funai Electric Co., Ltd.	06/23/2005 - 01/05/2006	Video reproducing apparatus
77%	US 6961382	Samsung	01/18/2000 - 11/01/2005	Moving picture experts group decoding apparatus and method for caption display
77%	US 06282244	United Microelectronics Corp.	08/20/1996 - 08/28/2001	Apparatus and method for decoding compressed digital video data
77%	US 20050055483	Not Assigned	08/22/2003 - 03/10/2005	System and method for file comperssion
77%	US 06366325	ATI International SRL	12/07/1998 - 04/02/2002	Single port video capture circuit and method
77%	US 06510554	DIVA Systems Corporation	04/27/1998 - 01/21/2003	Method for generating information sub- streams for FF/REW applications
77%	US 20050225673	Not Assigned	11/16/2004 - 10/13/2005	Method and system for vfc memory management
76%	US 05664218	Electronics and Telecommunications Research Institute	12/05/1994 - 09/02/1997	Integrated multimedia input/output processor
76%	US 6900845	Thomson Licensing S.A.	12/15/1997 - 05/31/2005	Memory architecture for a multiple format video signal processor
76%	US 20060050785	NuCORE Technology Inc.	09/09/2004 - 03/09/2006	Inserting a high resolution still image into a lower resolution video stream
76%	US 20030184675	International Business Machines Corporation	03/26/2002 - 10/02/2003	Digital video data scaler and method
76%	US 06256045	LG Electronics Inc.	02/19/1998 - 07/03/2001	Device and method for processing picture in MPEG decoder
76%	US 05737030	LG Electronics Inc.	10/15/1996 - 04/07/1998	Electronic program guide device
76%	US 05933195	Sarnoff Corporation	12/30/1997 - 08/03/1999	Method and apparatus memory requirements for storing reference frames in a video decoder
76%	US 20050018913	Not Assigned	07/23/2004 - 01/27/2005	APPARATUS FOR DECODING COMPRESSED IMAGES
76%	US 20020126225	Not Assigned	02/25/2002 - 09/12/2002	Video apparatus, notably video decoder, and process for memory control in such an apparatus
76%	US 20020130970	Not Assigned	08/19/1999 - 09/19/2002	APPARATUS AND METHOD FOR DISPLAY OF PROGRESSIVE AND INTERLACED VIDEO CONTENT
76%	US 20050062755	Not Assigned	09/18/2003 - 03/24/2005	YUV display buffer
76%	US 06417888	Matsushita Electric Industrial Co., Ltd.	10/09/1998 - 07/09/2002	On screen display processor
76%	US 20030190154	Not Assigned	05/22/2003 - 10/09/2003	Method and apparatus for data compression of multi-channel moving pictures
76%	US 06229576	Avid Technology, Inc.	04/03/1998 - 05/08/2001	Editing system with router for connection to HDTV circuitry
76%	US 20040184531	Not Assigned	03/19/2004 - 09/23/2004	Dual video compression method for network camera and network digital video recorder
76%	US 06160847	LSI Logic Corporation	06/26/1998 - 12/12/2000	Detection mechanism for video channel underflow in MPEG-2 video decoding
76%	US 20050007490	Not Assigned	06/30/2003 - 01/13/2005	Scaling by early deinterlacing
76%	US 05612788	Sony Corporation	05/18/1994 - 03/18/1997	Video data compression apparatus for recording and reproducing compressed video data at their variou
76%	US 06828987	ATI Technologies, Inc.	08/07/2001 - 12/07/2004	Method and apparatus for processing video and graphics data
76%	US 06717620	ATI Technologies, Inc.	06/12/1998 - 04/06/2004	Method and apparatus for decompressing compressed data
76%	US 20030123857	STMicroelectronics, Inc.	12/27/2001 - 07/03/2003	Apparatus and method for transcoding still image data files into MPEG video data files and digital v

76%	US 06295094	Koninklijke Philips Electronics N.V.	09/11/1997 - 09/25/2001	Instant replay of digital video optimized using non MPEG frame tags
76%	US 05712681	Samsung	05/26/1995 - 01/27/1998	Apparatus for inputting and outputting an optical image with means for compressing or expanding th
76%	US 06573945	General Instrument Corporation	01/12/2000 - 06/03/2003	Logo insertion on an HDTV encoder
76%	US 6992675	ATI Technologies, Inc.	02/04/2003 - 01/31/2006	System for displaying video on a portable device and method thereof
76%	US 05689800	Intel Corporation	06/23/1995 - 11/18/1997	Video feedback for reducing data rate or increasing quality in a video processing system

(**) signifies that the patent is unassigned.