

Animation Katha

Sujit Kumar Karmakar

Assistant Professor

School of Design III

Introduction

Animation is a series of still conjugative drawings with a systematic way that, when viewed in rapid succession, gives the impression of a moving picture.

The word **animation** derives from the Latin words '*anima*' meaning life, and '*animare*' meaning to breathe life into.

Animation can be mainly classified into two types –

Traditional: Traditional animation (classical animation or hand-drawn animation) is the primitive form of animation. In a traditionally-animated cartoon, each and every frame is drawn by hand. e.g. - earlier Disney cartoons like Snow White, Bambi etc.

Digital: Computer generated animation, which is the new face of animation. Here every single drawings, called 'frames', are generated by the proper use of computer. These can be done in software like Maya, Flash etc. e.g. – Ice Age, Up etc.

History of traditional animation –

- **Paleolithic era** – cave paintings, where animals are depicted with multiple legs in superimposed positions which are attempting to convey the perception of motion.
- **1906** - J. Stuart Blackton creates the first animated film which he calls "*Humorous phases of funny faces.*" The drawings of comical faces on a blackboard and filmed them. He uses to erase one face to draw another, and then film the newly drawn face.
- **1908** - French artist, Émile Cohl creates a film called *Fantasmagorie*. The film was made by drawing each and every frame on paper and then shooting each frame onto a negative film, which gave the picture a blackboard look.
- **1914** - Earl Hurd uses to apply for a patent for the technique of drawing the animated portion of an animation on a clear celluloid sheet and later photographing all the sheet with its matching background (Cel animation).
- **1914** - Winsor McCay produces a cartoon called "Gertie, The Trained Dinosaur" which consisted of 10,000 drawings.
- **1917** - The first feature-length animated film called "*El Apostol*" is created in Argentina by Quirino Cristiani.
- **1928** – Disney releases 'Steamboat Willie'. First Disney picture with synchronized sound.

- **1937** – Snow White and the seven Dwarfs becomes Disney’s first worldwide hit. Also the first animated film in Technicolor.
- **1949** – NBC-TV airs ‘Crusader Rabbit’, first animated series for TV.
- **1961** – ‘101 Dalmatians’ becomes the first animated movie to use Xerography.
- **1991** – Disney’s ‘Beauty and The Beast’, becomes the first and only full-length feature animated film to ever be nominated for an Academy Award for Best Picture.
- **2005** – Hanuman, India’s first major commercial animated feature released.

History of digital animation –

- **1963** - Ken Knowlton, working at Bell Laboratories, started developing computer tools and techniques for producing animated movies. Known as BEFLIX.

BEFLIX process:

Draw straight lines from multiple dots, Draw curves, Copy region, Move region, Solid fill area, Zoom area, Dissolve image transition

- **1963** – First computer generated film by Edward E. Zajac (Bell Labs), created on a IBM 7090
- **1967** – Lee Harrison's ANIMAC graphic device released
- **1972** – University of Utah, Fred Parke creates the world’s first computer generated facial animation.
- **1995** – ‘Toy Story’ from Pixar becomes first full-length 3D CG feature. Pixar used software like VIDI ModelerPro, Macromedia Macromodel, Alias Designer, Renderman, Marionette etc.
- **1998** – Maya 1.0 released. It revolutionizes 3D modeling.

MAJOR ANIMATION STUDIOS

- **1923** – Brothers Walt and Roy Disney found The **Walt Disney Company**.
- **1976** – **Aardman studios** comes up in Bristol, England. Specializing in claymation / stop-motion animation production houses. Their most popular movies being ‘Chicken Run’ and ‘Wallace and Gromit: Curse of the were rabbit’.
- **1980** – Warner Bros. Animation founded in Hollywood, California. It is the most successful to Warner Brothers Cartoons set up in 1933. Have created popular movies like ‘The Iron Giant’, ‘Space Jam’ (animation/live action), ‘The Ant Bully’ etc.
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- **1986** – **Pixar** Animation Studios founded in Emeryville, California. ‘Tin Toy’ becomes first computer animated film to win an Academy Award for best Animated Short film in 1988. Now one of the biggest names in CG animation today.
- **1987** – Six former employees of Robert Abel and Associates lay the foundations of ‘**Rhythm and Hues**’ Studios in Los Angeles California. ‘**Rhythm and Hues**’ won the Academy award as visual effects studio, it has offices in L.A., and Mumbai and Hyderabad, India.
- **1997** – **DreamWorks Animation SKG**, Inc. founded in Glendale, California. Have created films like ‘The Prince of Egypt’, ‘Antz’, The Shrek Trilogy, ‘Chicken Run’, ‘Spirit: Stallion of the Cimarron’ etc.
- **2002** – **Sony Pictures** Animation founded. Have created movies like ‘Open Season’ and Surf’s Up’.

ANIMATION IN INDIA

- For many people in India their first glimpses of animation were the Sunday morning Disney cartoons and the ‘**Ek Tittle Anek Titliyaan**’ short on National. But in India animation began much earlier, in fact as early as 1912.
- **In 1912 Dadasaheb Phalke** made his first Animation film using matchsticks and a stop-motion camera. The short film was not released.
- 1932 The first animation movie in India, ‘**The Pea Brothers**’, released in theaters.
- **1945** - After the early pioneers like **Dadasaheb Phalke, Gunamoy Banerjee, Bhaktaram Mitra** etc. the Government of India took up the cause of animation in India. The Ministry of Information and Broadcasting, through The Film Division in Mumbai, set up a ‘Cartoon Film Unit’.
- **1956** - One of the best animations of this era was ‘*Radha and Krishna*’ produced in Eastman color. It was a 22 minute ‘cel’ animated film using miniature paintings of Indian art. The animation was made by moving the camera over the paintings to get the illusion of motion.
- **1956** - Films Division, with the financial help of UNESCO and the US Technical Aid Disney animator Clair Weeks conducted a program, organized an intensive training session. As a result India got best animators such as **Ram Mohan, Bhimsain, Satam, Ezra Mir and Pramod Pati**.
- **1955** – Initiative to set up to promote children’s films, ‘The Children’s Film Society of India’ has been responsible for producing one of the highest number of animated films in India. The best known examples are *As You Like It* directed by Sukumar Pillay in 1965, *Lav Kush* directed by K.A. Abbas in 1973, *Jaise Ko Taisa* by Madhab Kunte in 1988 etc., all of which have won National Awards.
- **1971** - The animation department of the ‘National Institute of Design’ was founded. Considered by many to be the bedrock of animation teaching in India with training in traditional and computer-aided animation spanning all aspects of filmmaking. Has produced many gifted animators like Soma Banerjee, Vinita Desai, Nina Sabnani, Nagendra Patel, Shyam Patil, Shailesh Modi, Mita Bhagat and Prakash Moorthy.
- A number of talented young animators are working independently in India. People like Shilpa Ranade (Moni’s Dying), Irina Saakiyan (Hunchback Woman’s Tale), Vinay Rai (The Drummer), Rani Day Burra (The Louse Story) have all produced quality content that have won International acclaim.

- With such talent available, the only way Indian animation can go is UP. According to Ishu Patel, one of the members on National Film Board of Canada's finest animators, "I think thiscan only help to establish animation in India as an industry.

ANIMATION INDUSTRY OF INDIA

The Past:

- **Outsourcing started:** The Indian animation industry started when international animation companies began outsourcing their production work to India.
- **Birth of small studios:** Studios were established with small capitals and many lacked proper resources.
- **Growth of Industry:** Availability of technically trained and skilled manpower, prevalence of English as the second language, low cost of labour, infrastructure and India's ability to keep in step with the latest technological advances in Animation made the country attractive for outsourcing.
- **Advertising and Music channels take to Animation:** Besides outsourcing, the other sector credited with jump-starting the Indian animation industry is advertising.
- **400% growth in production investment:** Initially, Indian film producers were reluctant to invest in an art form with no clearly defined audience. However, with the success of Cartoon Network and Animation hits in Indian shores, this mindset underwent a complete change.
- **Big studios established:** Increase in popularity of animation and its recognition as a profitable industry has seen the infusion of large capital in Animation and emergence of big players.
- **Upcoming Animation hubs:** 90's saw a proliferation of animation studios cross the country, especially in the cities of Mumbai, Pune, Hyderabad, Bangalore, Chennai and Thiruvananthapuram.
- **Digital Wave is here:** Though these studios initially concentrated on creating 2D content, 3D is slowly making inroads in Indian Industry.
- **Training Schools:** The mid-90's also saw a number of training institutes, like The Film and Television Institute in Pune, being set up in major cities in the country.
- **Animation Professionals:** Institutes are today helping to create the manpower base for studios. Increase in quality of Indian content has seen the market increase many folds.

The Present:

- **Pre-Production Involvement:** Initially working only on low-skill activities like 'clean-up', 'in-betweening' and sometimes 'modeling', Indian studios have moved up the value-chain.
- **Post-Production Phase:** Indian animation and VFX studios are becoming a part of major Hollywood live-action and animated movies. They are working not only on pre-production but some post-production work as well. Currently Indian companies are working on nearly 39 international projects.
- **Introduction of Indian IP:** With the release of 'Hanuman', the Indian studios have also started the process of developing their own IP with a global audience in mind.

Companies in outsourcing:-

Animation and Visual effects	Graphics
1. MPC	1. Google
2. Mr. X	2. Flipkart
3. Double Negative	3. Amazon (UI&UX)
4. Firefly	4. Capgemini
5. Makuta VFX	5. Book my show
6. BOT VFX	6. Mindtree
7. Sparky	7. Nagarro
8. EA games	8. Yepp TV
9. Reliance Media Works	9. Lollypop
10. Gameshastra	10. Carbon12
11. Infobells Interactive Solutions	11. Studiofra
12. RGBA Studios Pvt Ltd	12. Redd
13. Rockstar India	13. Teclogiq
14. Colorstonz Creative Studios	14. Peppersquare
15. BS Talent Solution Pvt Ltd	15. Thence
16. Videogyan Studios	16. Lollypop UI/UX Design Studio

The Future:

- **Emerging Animation Fields:** Computer animation is one of the most rapidly growing areas of creative and technical development. Computer-generated 3D sequences in TV & movies, special effects, computer-animated simulator rides, computer video games and virtual environments are some of the more visible applications of 3D computer animation.
- **Huge Contracts:** Global entertainment giants like Walt Disney, Imax, Warner Brothers and Sony are signing up huge contracts with Indian animation companies.
- **International recognition:** Cartoon Network is buying animations made in India for international broadcast. MTV has added India to its outsourcing hub along with the Philippines and South Korea.
- Hyderabad based Applied Gravity Animation Studios has created an animatronics dog for Animal Planet for a popular episode called K9 to11. It has also created models for New Zealand theme parks.
- **International Quality:** If the present growth rate in the quality of Indian animation is maintained, India will soon have studios capable of handling international quality pre and post production work. They will also be able to provide facilities for scripting, sound, VFX etc. In short, total movie solution.
- **Animation Potential:** India truly has the potential to become a global super-power in the international animation arena. It is estimated to be an **80 billion Industry** in 2018 and grow at a CAGR of 25%. – NASSCOM

Conclusion

In this chapter, we had discussed on past present future era of animation.

References

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