

Introduction to an Epistemology of Viewing and Listening Dispositives

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For some years now, scholars working in the History and Aesthetics of the Cinema Department of the University of Lausanne's Faculté des Lettres have been actively engaged in research and teaching that stems from their belief that, at the present moment in time, one can no longer restrict one's approach to cinema to the narrow field and specific object that were established in the early decades of the 20th century, and that culminated in the semiotics approach of the 1970s. Paradoxically enough, this apotheosis occurred just as the model that in circa 1906 had reflected the independent and specific nature of cinematography and the cinematographic institution was clearly becoming obsolete with the multiplication both of the modes of capturing film (first video, then the DVD, computers, mobile telephones, etc.) and of audiovisual communication support systems and media (in particular television, and more recently the Internet).

The 'return' to history on the one hand¹ and the historicizing of aesthetics on the other hand – with the latter thereby bypassing an essentialist, ontological approach – are based on a new approach to the archive. They allow the researcher to widen the field of investigation and examine anew the different questions related to cinematographic 'language' and the problematics of representation – i.e., the practices and theories of viewing and listening which developed during the 19th century and were linked to the rapid industrial and technological development of western societies. The cinema is one of those instruments that condenses a whole series of distinctive characteristics of industrial and technological society (serialisation, the division of work, multiplication, mechanisation, standardisation, speed, globalization, etc.) – where a whole series of questions converges – from the social to the political, the medical to the ideological, the artistic to the anthropological, etc.

Since the middle of last century, it can be said that the field has been broadened by the arrival of the 'mass media' and mass communication in their relation to new mediums and media – the focus has moved from television to the Internet, digital technologies, and further beyond, to the issue of cloning. The key position that cinema occupied in the 1950s has consequently become relativized, even though its 'model' continues to organise much of the imagination in the shape of the procedures involved in the means of communication and media representation.

Once one is aware that the paradigm has shifted, one can, correlatively, take a fresh look at the 'cinema' sequence itself and approach it from other angles. Research into 'early cinema' has paved the way for this re-examination by highlighting its primarily heterogeneous aspects that both the history and the aesthetics of legitimation had suppressed. These traits had been partly envisaged in certain lines of research – including the nowadays disregarded but important work of the *Institut de Filmologie* (1947-1962) – which allowed one in particular to make a heuristic distinction between 'cinematic fact' and 'filmic fact', while maintaining a restrictive model of the 'cinematic'.²

In the wake of our contacts with 'early cinema' specialists such as Laurent Mannoni, Tom Gunning, André Gaudreault and Thomas Elsaesser, and as a result of our interest in new theories straddling the history of art, photography and the means of communication developed by such scholars as Jonathan Crary, Friedrich A. Kittler, Philippe Hamon and Stefan Andriopoulos, we decided to focus on an epistemological reflection on these questions in order to produce a revitalised conceptual framework for our historical and theoretical research, covering both the history of cinema and the aesthetics of cinema and its language.

The framework that has been developed arises out of a hypothesis, the '1900 episteme', which epitomises this body of phenomena, discourses and practices, many of whose distinctive features were incorporated into 'cinema' over a period of several decades.

The foundation of our reflection is a redefinition of the question of the 'dispositives', which can be used to construct a schema that then becomes an instrument of research.

Dispositive, epistemology

We shall now clarify the two key terms that we use: 'dispositive' and 'epistemology'.

The term 'dispositive' has come into English academic discourse through the translation of works by such scholars as Michel Foucault. The dispositive is a network of relations. The French equivalent, '*dispositif*', was originally used in legal contexts, and then spread to include the idea of disposition, whether of troops or in the field of mechanics. The word is so greatly exploited in French today that some of its original force has been diluted. It may designate any type of technical organisation or construction, or any arrangement, including with human actors, as long as it correlates actantial positions and relations. In French, it was quickly taken into the realm of scientific or technical experiments

(where one also speaks of experimental 'protocols') and is widely used in contemporary art to speak of an 'installation'.

The notion of dispositive is of particular interest here as it includes everything that is laid out in front of the spectator, together with all the elements that allow the representation to be viewed and heard. The dispositive involves both the making and the showing. The term is used when one or other of these aspects is addressed, on condition that it is considered as a network of relations between a spectator, the representation and the 'machinery' that allows the spectator to have access to the representation (cf. 'The 1900 Episteme'). However, the task of renewing the historiography of the cinema and, more generally, the audiovisual domain via the notion of dispositive implies constructing a knowledge (*savoir*) that reduces the concept neither to a strict historical actualization nor to a causal genealogy.

It is important to stress that dispositives have both a concrete existence – a cinema auditorium actually *exists* – and a discursive existence. For example, a particular phonographic practice may only be found in discourse, e.g., in literary discourse. Moreover, our long-term aim is not to describe the dispositives themselves, but the network of notions, theories, beliefs and practices that are woven into the discourses directly related to the elements of the dispositives, which are themselves put in relation within these discourses. By approaching dispositives from the angle of discourses, we are aiming to construct the conditions of possibility of the dispositives themselves as constituted knowledge.

For Michel Foucault, the notion of dispositive came to be increasingly associated with a strategic perspective, and then a perspective of power; moreover, the technologies of control (the key example being the *panopticon*) do not themselves define the category of *dispositive*, which is wider, i.e., the disciplinary regime or sexuality. In other words, from Foucault's point of view, neither 'cinema' nor the whole collection of audio and visual 'machines' in themselves constitute 'dispositives' but would have to be seen as belonging to an all-encompassing whole. When Paul Virilio introduced the problematic of a 'logistics of perception', he heralded such a whole, which would have situated dispositives of viewing (and, for us, listening) within a historical whole. But his idea has been only very partially developed.

Our definition of dispositive has therefore not been simply borrowed from Foucault: it comes not only from the exchanges in the field of the historiography of cinema, and particularly 'early' cinema, but also from the broadening of the discipline, which has freed itself from semiotic or aesthetic discourse on the one hand and a purely technical (i.e., historical or functionalist) discourse on the other. This is the background of our specific epistemological approach.

When one defines the dispositive as a network of relations that goes beyond the dispositive itself, one is already in a sense implying a method for defining the object.

It is also important to clarify our use of the term ‘epistemology’. Back in 1969, Foucault preferred to speak of ‘archaeology’, as a reflection of his decision to work on the margins of the sciences, on what Gaston Bachelard himself rejected as an ‘epistemological obstacle’ (i.e., the discourses and imaginary beliefs that obstruct the theoretical and straightforward constitution of the scientific concept), and Louis Althusser rejected as ideology. The present book covers similar territory: the ‘knowledge of dispositives’, their conditions of possibility, is a diffuse knowledge that is not determined by a type of enunciation or institution. Dispositives intersect with many discourses – many more than those discourses that are fighting for the institutionalization of dispositives themselves – such as cinema and photography. The discourses that appear in the following chapters are literary, scientific and technical, and may involve various other fields (legal and economic), social practices (tourism, sporting events) and, of course, cultural practices and spectacles (theatre, the circus, etc.). In other words, the knowledge of dispositives is not only constructed within the heterogeneity of sources and data, but also in the confrontation between the discursive and the concrete historical object, the social practice that it implies, and so on.

Archaeology is used here to mean an epistemology that does not aim at scientific coherence – but it is not the epistemology of a *tekne*. It aims to construct an *episteme* – a knowledge that is confronted with practices.

I ‘The 1900 Episteme’

The opening chapter of the volume, ‘The 1900 Episteme’, is a paper that François Albera and Maria Tortajada gave at a Domitor International Association symposium. It builds on the hypothesis that the new conditions of viewing that arose out of the industrial society of the 18th and 19th centuries reformulated the ‘spectator-spectacle’ schema by introducing the question of the *dispositive*, which assigns a new place to the viewer within a tripartite *spectator-machine-representation*. This tripartite representation must be constructed as an *epistemic schema* and, as such, integrated within a network, a wider epistemic configuration (that of cinematics, Marey’s physiology of movement, or social practices such as the railway journey and the spectacularisation of the landscape, bringing together an immobile spectator, a mobile spectacle and a framework of vision). Furthermore, in its capacity of schema, it provides a model not only within the restricted field of viewing and listening dispositives, but going beyond to

encompass that of visibility (painting, literature) and even that of thought ('cinema', a model of knowledge according to Bergson, a model of the psychic apparatus for some psychologists or psychoanalysts). The epistemic schema thus combines the specification of the *concrete elements* of the various dispositives with the *concepts* that are linked to them, for example, the notions of breaking down movement, temporal immediacy or deferred broadcasting, etc. Finally, in order for the schema to be constructed, it is vital simultaneously to develop a study of discourses, a study of concrete dispositives, and a study of the institutional and social practices that are both engaged by and engage these dispositives.

François Albera's chapter entitled 'Projected Cinema (A Hypothesis on the Cinema's Imagination)' follows on from the perspective outlined in 'The 1900 Episteme' by examining a historical and theoretical approach to the problematic of technical invention that revolves around audio and visual dispositives. His vision encompasses not only literary texts (Villiers de l'Isle Adam, de Chousy and Jules Verne), iconic texts (Robida), and scientific popularisation (Camille Flammarion), but also writers and philosophers (Rabelais, Campanella, Sorel and Cyrano de Bergerac) who were active long before the emergence of cinema and who thus belonged to a different topic, and others writing in the wake of the advent of cinema (Raymond Roussel, Saint-Pol-Roux, René Barjavel and Bioy Casares, as well as Giuseppe Lipparini, Maurice Renard, Maurice Leblanc, Léon Daudet and many others). His hypothesis is that the 'utopias' of communication technologies are not so much imaginations of precursors or prospective fantasies as stages of the invention itself that take the shape of actualizations of the potential inherent in the technologies of the day. Leaving aside the fact that these fictional works were part and parcel of the invention that was about to come into being, they offer fertile ground for experimentation, a space for extrapolation based on research and existing apparatuses or machines, and thus they bear witness both to the imaginary side of these technologies and the expectations to which they give rise. In the wake of Gilbert Simondon's reflections on the 'modes of existence of technical objects', one may indeed suggest that the 'genesis' of the invention is constituent of it. These 'fictions' consequently reveal certain dimensions of existing technologies from which they borrow, but which the catalogue of history – that gives precedence to one of the chosen usages – fails to record. What we have here is both the potential related to the medium or machine (once one has moved from small-scale production or the prototype to generalisation) and the expectations that they create, whether social, imaginary or pragmatic. The two types of discourse (fictional and learned on the one side, technical on the other) must thus be pitted one against the other within a space that is common to both. This leads to the reconfiguring of the audio-visual field, which grew out of social, industrial or ideological 'specialisations' that simply

ignored not only projects, but also transitory expectations or realisations. In this regard, one can cite the example of 'photosculpture' or the 'theatrophone'. Finally, these confrontations reveal the spaces of intelligibility of the new technologies and the conceptual and semantic field that is associated with them, and thus define the mental frame of the invention and its reception (Apollinaire extrapolated virtual imagery from the gramophone, while Saint-Pol Roux came up with human cloning from the cinema-machine).

In 'The Case for an Epistemography of Montage: The *Marey* Moment', Albera sets out to redefine the concept of 'montage'. This involves re-examining the *Marey* question or *Marey* 'moment' in the history, prehistory or archaeology of cinema. Albera distinguishes between on the one hand the technical-aesthetic discourse on montage (the *epistemonomical* level), which creates a set of limits and control principles and 'rules', and on the other hand the prescriptive discourse of cinema criticism and theory (the *epistemocritical* level), which defines the processes of inclusion in or exclusion from the concept of montage. This led him to construct the '*epistemological*' level of montage. On this level, it is vital not only to pinpoint the fields of application of the concepts and rules of usage, but also to identify transformations and variations, in order to relate them to their conditions of possibility. The aim is to understand how the conceptual field of montage has been transformed (via such notions as end, piece, moment, interval, intermittence, pause, phase, position, jerk, shock, dissociation, cut, break, interruption, discontinuity, joining, assembling, collage, link, continuity, articulation, succession, etc.) by leaving behind the purely internal, descriptive or prescriptive definitions and by going beyond obstacles of the technological type which impede or limit comprehension. This makes it possible both to identify the contours of a montage function, which may not be given that name but which needs to be linked to various procedures, practices and utterances, and to locate the thinking related to montage in the system of concepts and practices where it has its roots, and subsequently envisage its extension and variability. In this perspective, the *Marey* 'moment' is a key element of the puzzle: not only was he outside cinematographic teleology and yet present in the sequence of 'cinema' inventions (both conceptually and technically speaking) and gave the 'invention' both scientific and social respectability (*Académie des sciences, Collège de France*), but he belonged to a field – physiology – that had been well explored in conceptual terms and was the scene of fundamental controversies between opposing tendencies, abounding in a body of notions, concepts and practices that was to provide an 'interface' with the toys and machines used for animated images. *Marey's* *mechanistic* conception (the 'animal machine') would lead to his discovery of a *machinic* dispositive that is analogous to his object as an instrument of observation – the 'cinema' machine.

Maria Tortajada's two contributions, 'The "Cinematographic Snapshot": Re-reading Etienne-Jules Marey' and 'The Cinematograph versus Photography, or Cyclists and Time in the Work of Alfred Jarry', set out to define the *idea* of cinema and the *idea* of photography, two dispositives that were similar at around the turn of the 20th century and yet in opposition to each other. When cinema emerged, it was photography that played a part in defining its concepts and the imagery associated with it. Photography founded the 'cinema', or a certain idea of the cinema at this moment in time. Meanwhile, photography itself took on a new status in its confrontation with cinema. Examining the relations between the two dispositives means exploring the mechanical sources of modernity, since the notion of dispositive is intrinsically linked to mechanics and cinematics – movement and speed are associated both with cinema and photography in a variety of ways.

Etienne-Jules Marey's research is a key factor for understanding 'cinema' at the chronophotographic stage and provides a means of observing how cinema broke away from photography. It can be argued that one cannot conceive of cinema without taking chronophotography into account. By mastering the technique of the photographic snapshot, Marey conceived of a kind of 'cinema' that was determined by the conceptual and methodological premises of his scientific approach.

The photogram is generally considered a fixed image that is opposed to the reconstituted moving image that defines cinema. However, when one re-reads Marey, one begins to see that what fundamentally distinguishes cinema from photography is not simply the illusion of movement. The very status of photography, of the fixed image, is transformed by the cinematographic dispositive – the photogram is a snapshot whose nature is a paradoxical one. The analysis put forward here is based on a redefinition of the notion of instant, associated with the technique of the photographic snapshot and determined by the exposure time. The aim of the chapter is to show that one can conceive of *an instant that lasts*. This is what transpires when one begins to construct the concepts linked with the instant of illumination in Marey's writings. One can see how these concepts make up a system of relations within his various scientific proposals related to the photographic snapshot and chronophotography on fixed plates and film. This is the idea that Bergson dismissed when he radically separated the instant from the flow of time.

Alfred Jarry is associated with one of the major themes of modernity: mechanization. His novel, *The Supermale* (1901), is an excellent example of a series of reflections on 'bachelor machines'. There are only a limited number of explicit references to the cinematograph, but one can nevertheless show just how important it was to Jarry. His work is of interest because his writings, whether fiction or journalism, explore the potential of cinema that eludes not only most

aspects of the cinematographic dispositive of his contemporaries, but also what was to develop later and become dominant today. Jarry's works give concrete form to some of cinema's unexplored potential, as they use cinema to conceive and represent a certain experience of time and speed linked to modernity. They use cinema to project themselves into a philosophical fiction, Jarry's 'pataphysics'. Jarry's ideas are a clear illustration of the fact that dispositives should be understood within a system of relations. Cinema and photography are brought together by means of the presuppositions that their representations set in motion. In short, they stand in opposition to several of their defining characteristics, which link them to a network of notions or practices belonging to the highly paradoxical modernity that Jarry describes.

The references to photography and cinema may thus be put in parallel. Between a conception of the instant and a conception of movement and speed, between Zeno and Bergson, Jarry plays with the paradoxes of time by making them materialise as representations that can only be fully understood by reference to the dispositives of viewing and listening.

2 The exhibition

The second section of the book examines the dispositive of the 'exhibition' and its relation to the cinematographic dispositive. Olivier Lugon's two chapters take the reader beyond cinema proper by studying the way in which cinema was taken beyond its own limits when it crossed paths with other media. He develops two examples: the exhibition and the lecture, calling on two of the key figures of modernism, Herbert Bayer for the exhibition and Le Corbusier for the lecture. Both explicitly referred to cinema as a model, and especially to the idea of a certain dispositive whose various elements they utilised in order to explain different aspects of their own designs. These include a temporal and rhythmic definition of visual art, the sequential nature of the film, the event-like character of the presentation of luminous images, the play of silence and of the voice, and the effects of surprise or shock that are attributed to montage. These are all forces that can be used to capture the spectators' attention and can thus be highly efficient for the communication of ideas.

These two examples show us how communication in the 20th century relied not only on the forms of representation, but also on the control over the dispositive of 'showing' and the meeting between the spectator and the image. The specific nature of the spatial and temporal framework used to present the image, i.e., what surrounds and supports it, may be as important for constructing its meaning as what it actually contains.

This is the case with photography, which is analysed through the way it is exploited in the staging of Herbert Bayer's exhibitions. In 'Dynamic Paths of Thought: Exhibition Design, Photography and Circulation in the Work of Herbert Bayer', Lugon describes Bayer's career as an artist, graphic designer and exhibition designer from Germany in the 1920s to the US of the 1940s. He looks at the theoretical foundation of Bayer's work and the way it evolved over the years, with particular attention paid to the omnipresent question of the spectator's mobility and circulation. Here is the very centre of Bayer's strategies, where he turns the movements of visitors into a tool of communication. He creates scenarios by building circuits, developing narrative and emotional sequences by setting out a route and channelling spectators through it. This can be seen in the MoMA's 1942 propaganda exhibition, *The Road to Victory*, where the principle of cinema is reversed by locating the development of the montage, narration and emotional drama in the spectators' very movements. Thus, physical mobility establishes a particular form of 'cinema' which by claiming to lead to greater participation in fact tends to increase the psychological hold it exercises over the spectators.

'The Lecture: Le Corbusier's Use of the Word, Drawing and Projection' looks at the lecture as a dispositive and multimedia 'spectacle' through Le Corbusier's extensive experience as a lecturer. He devoted forty years to his 'lecture technique' by developing multiple and changing forms of interaction of voice, direct drawing, and the projection of fixed and moving images. He thus embellished his scenic and performative art by exploiting mechanical forms of showing images, the aim being to develop a force of persuasion that would go beyond the actual event itself by means of further publications and exhibitions, which were themselves characterised by these scenic dispositives and complex forms of projection accompanied by spoken commentary.

3 Voice/body

The third section of the book looks at questions that relate to how manifestations of human presence materialise within the representations that emerge from dispositives involving machines. Alain Boillat and Laurent Guido examine the mechanical evolution of the human element within anthropocentric audiovisual dispositives and concentrate on two elements – the voice and the body – that belong to different aspects of spectacular practices. On the one hand, considerations of the voice's status have been common within the major paradigms that determined the development of technological and cultural series and that share much with the 'cinema' series – in particular the means of reproducing

and broadcasting sounds during the second half of the 19th century. These considerations have determined how the interactions between the auditive and visual dimensions of the representation were envisaged (i.e., the image of the talking subject). On the other hand, the issue of the body refers not only to certain modes of analysing and representing human movement that were developed over this same period, but also to certain scenic approaches that were adopted within particular dispositives and that these dispositives themselves influenced. There is, of course, a fundamental difference between the disembodied voice of the phonograph or telephone and the physical presence of the body shown by viewing dispositives. Nonetheless, both voice and body are manifest in the 'presence-absence' schema that is inherent to every representation, though in varying degrees and in accordance with a variety of modalities.

Manifestations of the voice and the image of the body are sometimes transposed in time and/or space and may also be firmly located in the *hic et nunc* of production-reception. Alain Boillat draws a distinction between *talking* cinema and *spoken* cinema in order to account for this distinction between the fixing of the voice by the machine and the live situation of orality. These two systems cannot be divided into strict periods, even if the lecturer of early cinema did become a major figure of the talkie, but can be examined from the perspective of 'cinema' archaeology. Quotation marks should be used here, as the objective is to dismantle the 'cinema' object in order to examine the technological series or parallel traditions of the spectacular, such as the talking or dancing automaton, the phonograph, opera, etc. In 'The Lecturer, the Image, the Machine and the Audio-Spectator: The Voice as a Component Part of Audiovisual Dispositives', Boillat reflects on the use of 'sounds before the talkie' by following two lines of enquiry. Firstly, he focuses on the often overlooked voice, whose specific characteristics have to be studied in order to understand the phenomena that it involves. Secondly, he uses Albera's and Tortajada's concept of the visual dispositive to examine the roles of the live speaker, who is a veritable mediator between the audience and the screen. This second premise means adapting Albera's and Tortajada's parameters to include interactions between images and sounds – i.e., making the network of relations resulting from the simultaneous presence of the three poles of the dispositive more complex and broadening the 'machinery' to include a wider whole, with human actors and the production space of the audiovisual representation. Boillat also looks at what orality implies when it is an integral part of a production space that is partly *machinic* in character. The theoretical framework is based on the contemporary accounts or the hypotheses of early cinema historians, and allows one to envisage how the lecturer's different functions varied according to the place that was attributed to him. The cinematographic spectacle is not envisaged from one viewpoint but calls on the diversity of the dispositives used.

The world of fiction – where the possible can take concrete shape – was the preferred means of expression for the imagination and the imaginary worlds that emerged from the spreading of (audio)visual technologies. Thus, to answer the questions regarding certain specific dispositives, one needs to take into account the literary texts that feature machines that perform before an audience in a fictional context. Writing thus becomes a mediation that mirrors the audiovisual production produced by a dispositive, while offering an indication of how the dispositive might be received. In ‘On the Singular Status of the Human Voice: *Tomorrow’s Eve* and the Cultural Series of Talking Machines’, Alain Boilat highlights the issue of the inscription of the voice by examining Villiers de l’Isle Adam’s novel, *Tomorrow’s Eve*, with its well-known example of ‘projected cinema’. He uses the perspective of the archaeology of talking ‘cinema’ to examine the place and function of the voice via anthropomorphic simulacra – a genuine audiovisual dispositive – in de Villiers’s novel and, more generally, the specific characteristics of the voice considered as an affirmation of the presence of the human in the machine. When the voice is reproduced via the phonograph, it leads to a system of ‘presence-absence’ that can be compared to Christian Metz’s writings on the ‘impression of reality’ in the cinema. In *Tomorrow’s Eve*, Edison’s inventions – which, in epistemological terms, are observed in all their diversity (and not just the oft-quoted description of stereoscopic projection) – are associated with the principle of *delinking* that is generally hidden in talking cinema because of the primary position accorded to the unique speaking subject. The anguish brought about by the dehumanizing exhibition of the *machinic* dimension seems both to underpin the novelist’s fetishistic description of the technology and encourage interest in the occult, with Villiers calling on a *spiritist* argument that was symptomatic of the way recorded voices were understood at the end of the 19th century.

Laurent Guido’s chapter entitled ‘Dancing Dolls and Mechanical Eyes: Tracking an Obsessive Motive from Ballet to Cinema’ uses a similar approach. Guido highlights certain variations in a dispositive where the spectacle of the dancing body is mediated via a viewing technique that sets out to enlarge and examine the details of a physical performance. He investigates the representations that refer first and foremost to literary writings that were marked by the Romantic reaction to the mechanistic model (Hoffmann, Kleist), and then concentrates on the imaginary world of librettos and certain processes that are particular to French ballet. He also examines the theoretical questions that dominated the arts that were inspired by body movements when the cinematograph was being developed. There emerges the conception of a human – usually female – figure that is progressively reduced to its mechanical dimension, and limited in particular to the rhythmic parameters that emerged from the scientific study of movement, where the body was treated as a mere object. The chronophoto-

graphic and then cinematographic camera were developed as analytical instruments, before finally establishing themselves as the prosthetic tool *par excellence*, covering functions that were previously occupied by such technologies as the opera glass.

However, one should not confine oneself to the imaginary representations of dispositives but, when considering the body, bear in mind a more pragmatic consideration of the various ways in which the cinematographic representation reformulates certain fundamental characteristics of viewing in the scenic arts.

One of the key models that influenced the aesthetic and social reflections on the audiovisual spectacle was the opera, especially Wagner's utopian *Gesamtkunstwerk* and its ideal of a rhythmic interaction between the different modes of expression. However, it is the less recognised forms of theatre and dance (i.e., the music hall, acrobatics and the circus) which, from a historical perspective, were the key factors that influenced the way the body was handled in the cinema. This can be seen in the short acts reconfigured for the camera in early films or the countless musicals and choreographic performances shown in cinemas or on television. Irrespective of whether these performances constitute the film's main theme or are simply partly autonomous moments of attraction, they refer to two canonical modes of representation of the body. On the one hand, there is the respect for the integrity of the original physical performance. On the other hand, the performance is edited and inserted in a dynamic series of shots. Both of these important paradigms make up varied and *secondary* actualisations of *primary* dispositives relating to the code of body movements in scenic spectacles.

Laurent Guido, in his chapter entitled 'From Broadcast Performance to Virtual Show: Television's Tennis Dispositive', concentrates on one of the relationships between two successive dispositives. He aims systematically to identify some of the aesthetic and dramatic implications of how tennis is filmed and edited when it is broadcast live, in other words the media dispositive that turns it into a television spectacle. Particular attention is paid both to the relationship between the *scenic* representation that is employed in the stadium and to the sequencing of the different viewpoints that make up the film version, by increasing the number of cameras used. The recurring figures that stand out during this live *cutting* are organised by switching between the all-encompassing and geometrical vision of the match (overview from above or even from the air) and a series of shots that concentrates on the individual gestures and emotions, which are mainly filmed at court level. While examining different broadcasts of the Wimbledon tennis tournament over the period 1997-2007, Guido also adopts a historical perspective that highlights how some traditional uses and modes of representation have been maintained over a long period, while others have changed. This change is especially evident in the notion of 'plurifocality'

and the question of the analysis and animation of 'invisible' gestures that arose with the first photographic and cinematographic images of sports events, from Georges Demenÿ to Leni Riefenstahl.

Overture

The contributions in the current volume are part of a broader research project being conducted at the University of Lausanne. A series of related developments have been undertaken either by the authors of the present book (bibliographical details of whom can be found below) or by researchers, lecturers and PhD students who are currently working on similar themes. Some examples of current research projects include medical discourses linked to the appearance of the cinema at the end of the 19th century, the archaeological approach to voyeurism, which evolved into one of the recurrent concepts of cinematographic studies, the introduction of audiovisual technologies in contemporary theatre and how they have affected not only the actor's body but also the television dispositive as it spread in the 1950s, and finally Swiss national exhibitions, where both cinematic and audiovisual means have been regularly employed.

This body of research starts with cinema while attempting to broaden the field and perceive it at a crossroads of other cultural, cognitive or social series. This is unique within French-speaking Europe, where scholars are often concerned with staying within the boundaries of conventional cinema studies as defined by cinema critics and the general public. It is clear, however, that various transformations, whether on the technological level or those involving customs and social practices, have shifted the boundaries of this restricted 'model' once and for all. It would, however, be foolish to deny that the model itself is going through a crisis. The field of art has absorbed cinema within a medley of disparate categories; the new media have employed cinema for other purposes and connected it with other sources. Even the parameters of cinema's canonical exploitation are changing with the new, miniaturized means of reproduction. When we examine the 19th-century novelists who 'projected' the future cinema and the aspirations and undertakings of avant-garde artists and theorists such as Lissitzky, Gan, Vertov, Klutskis, Arvatov, etc., we see that 'cinema' potentially contained today's diversification, or hinted at possibilities that were never fully developed. Archaeology is thus a means of constructing the present.

Notes

1. The perspective is quite different from that of the pioneers who fought for recognition of the medium.
2. The emergence of film studies, launched by Gilbert Cohen-Seat in 1946, coincided with the domination of cinema over the audiovisual field and beyond, the 'mass media'. Its 'end' coincided with television taking over the dominant position, and the fact that sociologists took other mass media into account (the illustrated press, photographs, advertising, etc.). Roland Barthes, who took part in research work at the *Institut de Filmologie*, wrote about this 'move', which he himself made, in his review of the 'First International Conference on Visual Information, Milan' (9-12 July 1961) (*Communications* no. 1, 1961) – he calls on people to question 'the imperialism of the cinema over the other means of visual information'. 'Cinema's domination is doubtless justified "historically"', he continues, 'but it cannot be justified epistemologically'. One year previously, he stated that cinema was 'recognised as the model of the mass media' ('Les "unités traumatiques" au cinéma. Principes de recherche', *Revue internationale de Filmologie*, no. 34, July-September 1960).