THE UNIVERSITY OF CALGARY

THE IMPACT OF SETTING ON THE MOTION PICTURE VIEWING EXPERIENCE

By .

Sandra Katherine Green

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DEPARTMENT OF COMMUNICATION STUDIES

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THE UNIVERSITY OF CALGARY FACULTY OF GRADUATE STUDIES

The undersigned certify that they have read, and recommend to the Faculty of Graduate Studies for acceptance, a thesis entitled "The Impact of Setting on the Motion Picture Viewing Experience" submitted by Sandra K. Green in partial fulfillment of the requirements for the degree of Master of Arts.

Dr. Pamela M. McCallum, Department of English

Dr. Tom McPhail,

Communication Studies Program

Dr. Ron Sept,

Communication Studies Program

Dr. Greg Fouts,

Department of Psychology

Sept · 27, 1889 (Date)

Abstract

This thesis reports an investigation into the impact of setting on the motion picture viewing experience. Contributing to this report are: a historical overview of motion picture exhibition in North America, a review of several relevent theoritical perspectives and previous research efforts, and a field experiment employing two movie viewing environments, theater and in-home video settings, and two feature length American motion pictures, *Blade Runner* (1982) and *The Name of the Rose* (1986).

Based on background information gathered, it was hypothesized that theater viewers would evaluate the movies more positively, in terms of artistic merit and realism, than would video viewers. No differences in viewers' evaluations of enjoyment were expected between viewing environments. To test these hypotheses, responses to 34 bi-polar adjective scales, were collected from 100 undergraduate psychology students, each of whom had viewed one of the movies in one of the environments.

The results show that theater viewers rated the movies as possessing greater artistic merit than video viewers. No differences attributable to environmental variables were recorded for enjoyment and realism evaluations. It is suggested that evaluations which are related to the viewer's affective state are more susceptible to environmental influences than are evaluations related to the viewer's intellect and good-taste. Implications arising from this research concerning the future of theatrical exhibition are discussed and suggestions for further research are made.

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Chapter 1

Introduction

In this age of transportable media, little attention has been given to the possible effects of environmental variables on the interpretation and appreciation of media messages. This is an issue worthy of consideration, for many media once confined to particular environments have been liberated by modern technology. In the past, the only truly portable medium was print. Today, consumers can enjoy their preferred medium just about anywhere: television, compact discs, computers are never out of reach.

It is interesting to speculate whether situational factors alter the significance of messages delivered over transportable media. Do receivers interpret the messages differently as a function of setting? For example, how is the experience of listening to a live radio commentary of a hockey game changed by personal attendance at the game. Does the information provided by the radio commentator carry more meaning for these listeners than for hockey fans listening at home? Or, does the home listener pay closer attention to the commentary, having no other source of information? What effect does Beethoven's Fifth arouse when heard via a portable cassette tape player on a Greyhound bus en route through the Rocky Mountains? How is it different from listening to the same piece through a high performance stereo system, over a snifter of cognac, in front of a gentle fire? Would we feel the same way if we heard it played by a symphony orchestra in a concert hall on opening night? The content of the media can be exactly the same, yet the experience of it unique to each situation.

Motion Pictures and Settings

In addition to "take-out media", the past decade has also witnessed the emergence of home-versions of media previously only available in specialized

environments. The computer is one such medium. A more traditional medium to make the transition is motion pictures. Although motion pictures first became available to home audiences in 1957, ten years after the advent of commercial television, it was not until the introduction of videocassette players (VCRs) in 1975 that movies were truly freed from the confines of the cinema.

In the early years, television only aired movies that had long since played in the theaters (Guback, 1987). Later on, television stations began producing "madefor-tv" movies in an effort to avoid the high cost of leasing from the major motion picture studios (Balio, 1985b). These low budget productions were unable to consistently attract the kind of talent that Hollywood could afford. Moreover, they lacked the technical sophistication of the major studios' productions. In any event, televised movies, whether made-for-tv or major releases, imposed commercial interruptions and censorious editing on the viewer. The introduction of the videocassette player provided in-home audiences with a means of viewing unedited, uninterrupted major motion pictures. While the videocassette release of a movie is still somewhat delayed, now the waiting period is only a matter of months rather than years (Taub, 1983).

The unprecedented control, convenience, and choice offered by videocassette players have made them very popular. Whereas theater-goers are limited in their choice of titles and show-times, video viewers can choose from potentially thousands of titles (depending on the selection available at their local vendors), and play them anytime they desire. Moreover, these viewers can stop, fast forward, rewind or pause the action at their convenience. The continuity of flow, even the sequencing of the video can be altered at the discretion of the viewer. Videocassette players also offer the comforts of in-home viewing. In the privacy of one's own home, one can wear what one wants (including nothing), drink and eat

whatever gives one pleasure, all the while watching a movie sideways, that is, lying down.

The popularity of videocassette players continues to grow. Penetration rates in Canada have jumped from about 8 percent in 1981 ("Dailies fuel exhib," 1981) to over 50 percent in 1988 (BBM Bureau of Broadcast Measurement, 1988). A study conducted by BBM Bureau of Broadcast Measurement (BBM) in 1985 and in 1986, indicated that Canadians use their VCRs primarily for the purpose of viewing rented movies; 57 percent of VCR use compared to 41 percent for time-shifting and one percent for home videos. This finding is verified by the fact that sales and rentals of prerecorded videocassettes is one of the fastest growing businesses in the marketplace (Cook, 1984; "Now playing," 1987).

Despite the popularity of this new viewing alternative, watching a movie in a theater is still considered by most people a more fulfilling experience than watching a movie at home ("Dailies fuel exhib," 1981). Although it is generally acknowledged that there are conveniences specific to the in-home environment that make it an attractive alternative, few would contest the superiority of the theater setting. This exhibition forum developed along side of the medium, continually adapting to technological advances, economic fluctuations, and sociocultural trends. According to Famous Players Theaters, one of the major theater chains operating in Canada, theatrical exhibition is, "the way motion pictures were meant to be seen and heard".

The refinement of the theater environment is most evident in the superiority of its technology. While television and video technologies are becoming increasingly sophisticated, they are, as yet, no match for theatrical exhibition. In any case, state-of-the-art "in-home entertainment systems" are beyond the financial reach of the average movie fan. Screen size, picture quality and sound quality are the most notable of theaters' advantages. However, the lure of theaters goes beyond finer technical resources. Theater attendance offers entertainment-seekers an

opportunity to "get out of the house". Moreover, there is an ambience about theaters that holds its own attraction for audience members. The smell of the popcorn, the crowd, the gaudy (and more recently, highly polished) decor, all combine to make an occasion out of "catching a flick".

Yet, despite the high regard held for theatrical exhibition, this entertainment forum is slowly but steadily losing patrons. Total attendance in Canada for the 1985-1986 fiscal year was 80.6 million, a decline of 20 percent from 1980-1981 (Strike, 1988). Whatever the "something extra" is that theaters are suppose to add to the viewing experience, has not been enough to keep theater-goers coming back. In assessing the impact of new in-home viewing technologies on theater attendance, Wenmouth Williams Jr. and Mitchell Shapiro (1985), communication researchers, came to the following conclusion:

The demise of the theatrically exhibited motion picture, as we know it today, is inevitable unless the film industry, especially exhibitors, becomes more interested in and competitive with home technology. (p.100)

Now that the differences between theater and in-home programming have been minimized, the role of setting has taken on greater importance. To become more competitive exhibitors must gain insight into what makes their service unique; how is it different from television viewing, and how is it better. Those aspects of movie viewing that are heightened by the theater environment, if any, must be exploited to maximize their drawing potential. If it can be demonstrated that the motion picture viewing experience is quantitatively superior in theaters as compared to in the home, exhibitors will have a valuable marketing weapon for safeguarding their businesses.

The Research Goal

One of the most fundamental way that setting could affect the viewing experience would be to alter audiences' appreciation of motion pictures. If theater

audiences, then setting may be said to have a substantial impact on the viewing experience. On the other hand, if video viewers gave the motion picture superior ratings compared to theater viewers then the "common knowledge" that theater viewing is better would either have to rest on the premise that most people prefer the theater environment for reasons unrelated to the content of motion pictures, or have to be dismissed as a fallacy. If theater and video audiences' ratings of the movie were equal, then any effect setting might have on the experience may only extend as far as individual preferences for viewing environments. To assess the nature and extent of influence exercised by setting on the motion picture viewing experience, comparisons must be made between audiences' reactions to a given motion picture in different viewing environments. It is the aim of this research to gain a more solid understanding of the role of setting in the motion picture viewing experience by collecting and interpreting this information.

The research to be presented in this thesis is exploratory. This is to say that after an extensive literature review no previous research has been identified that directly addresses the issues at hand. While there have been systematic investigations into the impact of in-home viewing alternatives on theater attendance (See Austin, 1986; DeFleur and Ball-Rokeach, 1983; Guback, 1987; Williams and Shapiro, 1985) these studies do not actually compare the viewing experience across viewing environments. Some film critics have expressed interest in the problem; however their analyses are based on personal experiences and, while interesting and often informative, are limited in their explanatory power (See Canby, 1988; Denby, 1988). The research conducted for this thesis attempts to quantitatively illustrate the impact of setting on audiences' appreciation of motion pictures.

Information arising out of this research may be useful to motion picture exhibitors for devising marketing strategies to counter the competitive threat of in-

home viewing alternatives, and for implementing changes that will enhance the theater-going experience. Video vendors can also benefit from this research. With the knowledge of how video viewing equals or surpasses theater viewing, video vendors can promote the most appealing aspects of their products and service. On a more global level, the results of this research will hopefully provide insight into how environmental variables can effect the reception of a media message. As mentioned earlier, this type of information is becoming increasingly valuable as more media become transportable. If the motion picture viewing experience is found to be influenced by environmental variables, it would be reasonable to expect that other media may be similarly affected.

Limitations

The scope of the research reported in this thesis is limited by the size and composition of the sample population, the specific movies used, and the specific theater used in this investigation. Particularly problematic is the issue of the movies. The impact of setting on the viewing experience may vary across movie genres, or even across different movies within the same genre. However, as mentioned earlier, this area of research can be described as still in its infancy in that the existence of an effect has yet to be established. This study, while limited in its application, will hopefully provide direction for further research.

Outline of Thesis

The chapters that follow document stages of the research process undertaken for this thesis project. A brief historical overview of motion picture exhibition and audiences in North America comprises the contents of Chapter Two. The purpose of this overview is to provide the reader with a contextual background from which to judge the significance of the present research. Chapter Three is a compilation of theoretical constructs and prior research in related areas. This review attempts to clarify the approach taken in the present research and to justify the rationale behind

the specific measurements taken. Chapter Four reports on the methodology employed in carrying out the research. Chapter Five presents the results of the data collection and Chapter Six is a discussion of possible interpretations and conclusions of the results and suggestions for future research.

Chapter 2

A Brief Historical Overview of Motion Picture

Exhibition in North America

This chapter aims to provide a contextual background for the research presented later in this thesis. Towards this end, a brief review of motion picture exhibition and audiences in North America from the late 1800s until today has been documented. The material covered is by no means exhaustive. Only major milestones in the history of exhibition are mentioned. The information presented in this overview, is meant to illustrate the current role of motion picture exhibition in our society, how it came to be, and how it is changing.

Much of the information to be reviewed in this section is of U.S. origin. This is due to the fact that the industry treats Canada and the U.S. as a single market (Sherman, 1986). Whenever possible, information specific to the Canadian market will be supplied. However, for the most part, issues of historical significance to motion picture exhibition do not seem to differ substantially between the United States and Canada.

Vaudeville and Nickelodeon Theaters

The first motion picture audiences were patrons of vaudeville, a form of stage entertainment that became popular in the late 1800s. Typically, a vaudeville format was comprised of a variety of separate acts performed in succession (Allen, 1985). Acts could include anything from animal tricks to poetry readings, although stand-up comedy and slap-stick skits were the most popular fare of the day.

Theaters for vaudeville performances were respectable and dignified establishments:

The architectural and interior environments in which vaudeville was presented rivaled if not exceeded those of the legitimate houses. (Allen, 1985, p.62)

The pleasing environment, reasonable admission prices and "morally appropriate" (Ibid., p.64) entertainment gave vaudeville broad public appeal. Audiences were made up of mostly middle-class families. However, people from the fringes of the upper- and lower-classes often attended as well.

To be considered suitable fare for a vaudeville production an act had to be respectable, entertaining and, most importantly, novel. The motion picture, born out of scientific curiosity and reared by entrepreneurial interests, was a natural for the vaudeville stage. Not only was it a mechanical wonder in its own right, it also had the capacity to continually provide fresh content. Films could be informative, exotic, amusing or simply aesthetically pleasing. Vaudeville owners were quick to recognize the potential appeal of this new medium and movies soon became a regular feature of most shows (Allen, 1985).

The profit making potential of motion picture exhibition did not escape the notice of other ambitious entrepreneurs. These men were the proprietors of the first cinemas, commonly known as nickelodeons. These make-shift theaters required a minimal amount of capital to start-up and consequently became extremely popular very quickly:

The ease with which a nickelodeon could be established in a busy big shopping area - one need only a store-front, projector, chairs and films - caused the number of nickelodeons in some cities to reach saturation levels within a very short time. (Allen, 1985, p.78)

As a business venture, the foremost goal of the nickelodeon was to get the paying public through the door. Towards this end, nickelodeon owners built conspicuously gaudy facades on the store fronts of their businesses:

The nickelodeon front was the apotheosis of pressed tin and the light bulb; in it the use of this combination of materials was raised to an art form. (Morrison, 1974, p.7)

In stark contrast, the interior of a typical nickelodeon was little more than a small, poorly ventilated room with a few rows of straight-backed chairs and a stretched sheet or sometimes a mirror for a screen (Morrison, 1974).

The fierce competition between nickelodeon owners quickly brought about improvements in the comfort and quality of these establishments (Allen, 1985). Competition also resulted in a serious shortage of films. There were simply too many exhibitors and not enough product. To survive, many nickelodeons had to take on inexpensive live acts and assume a more traditional stage entertainment format (Ibid.). While movies were still billed as the feature attraction, many nickelodeons became minor vaudeville houses.

The rewards were large for smart investors. If their location was good and their theater comfortable, if they could secure a reliable supply of movies, the nickelodeon owner could make a substantial return on his investment. People came out in droves to experience the latest marvel of technological ingenuity and, more importantly, they kept coming back:

If we may believe the most conservative estimates, by 1910 nickelodeons were attracting some 26 million Americans every week, a little less than 20 per-cent of the population. (Merritt, 1985, p.86)

Most of these Americans had working-class backgrounds. Middle-class citizens were still more interested in attending vaudeville or legitimate theaters.

Early Motion Picture Audiences

While most nickelodeons depended upon the support of working class patrons, little regard was shown for their patronage. In some cases members of the working class were actually dissuaded from attending (Merritt, 1985). Nickelodeon owners shamelessly courted the more affluent middle-class with the ambition of raising their own social standing and securing greater prestige for their profession (Ibid.). Some owners even moved their operations into old legitimate theater

houses, allowing them to increase their seating capacity and charge higher admission prices (Allen, 1985). Such changes were often made in the interests of drawing a higher class of patron into the nickelodeon:

Many people, particularly middle-class patrons, were willing to pay an additional nickel or dime to see a show in more comfortable and genteel surroundings than those offered by a typical nickelodeon. (Allen, 1985, p.79)

Although, exhibitors were eventually successful in their efforts to woo middle class support, the lower class never really relinquished their place in the motion picture theater audience.

Low cost was probably the primary motivating factor for members of the working class in deciding to go out to the movies. Although the nation as a whole was experiencing an increase in standard of living, disposable income for working class citizens was, as always, limited. It might also have been that subcultural differences deterred members of the working class from attending either vaudeville or legitimate theater performances. If so, nickelodeons would constitute the only real option for stage entertainment.

Arguably, the pomp and circumstance associated with the traditional theater settings may have caused some people to feel ill at ease in those surroundings. Attendance at a nickelodeon did not require a person to be fashionably dressed or socially graceful. Movies provided a welcomed reprieve from laborious and, more often than not, tedious jobs. Viewing a movie was neither mentally nor physically taxing, unlike athletic or scholarly past-times. One could see a movie at just about any time of day, which was essential for people working shifts, and it was something the entire family could enjoy (Merritt, 1985).

What motivated early motion picture audiences to attend so frequently?

Was there some intrinsic quality in movies that sustained their interest, or was it simply a lack of suitable entertainment alternatives? Garth Jowett, film historian,

provides insight into possible religious, social and economic conditions that may have motivated the first motion picture audiences.

Jowett (1974) makes the observation that the demand for virtually any form of amusement was very high in the early 1900s. The influx of rural dwellers and immigrants into the urban centers, along with decreased working hours and an increase in the overall prosperity of the nation, created ideal conditions for a bull market in recreation and leisure industries. Not surprisingly, demand gave birth to a wide range of profit-motivated amusement ventures:

The dime museum, dance halls (which were extremely popular, but also a great source of consternation to many city authorities), shooting galleries, beer gardens, bowling lanes, billiard parlors, saloons and other more questionable social activities. (Ibid., p.43)

Many of these entertainment alternatives were not viable options for large segments of the population. Some people were restricted because of monetary concerns, others, out of propriety, and for many it was a combination of both these things. According to Jowett, the major criterion for choosing leisure time activities were "moral acceptability and low cost" (Ibid., p.45). More than any other entertainment alternative of the time, motion pictures filled these requirements.

In accounting for the sudden and wide-spread popularity of motion pictures,

Jowett also makes mention of the growing sophistication of audiences. In his view, a
new-found appreciation for realism in the treatment of theatrical subject matter
developed along with technical advances in theater equipment. He mentions as an
example the effect of electricity on stage entertainment:

The dramatic improvement in theatrical lighting with the introduction of electricity ... helped to destroy many illusionary effects. (Ibid., p.45) Motion pictures, of course, were able to out-match any other theatrical form in terms of realism. Film could capture live events in natural settings and bring fictional characters alive by placing them in real world environments.

In his final analysis, Jowett attributes the popularity of motion pictures to a lack of practical leisure time alternatives. He mentions, for example, the lack of playgrounds and affordable amusements in working class districts (Ibid., p.52).

The Picture Palace

The economic prosperity that accompanied the end of the first World War instilled in people a general sense of optimism about the possibilities of fame and fortune:

Everywhere there was a thirsty curiosity about the lives of the rich and the surroundings those lives were lived in. Hollywood knew this, and the rags-to-riches story was filmdom's bread and butter. (Hall, 1961, p.42)

Moviemakers capitalized on the common man's daydreams by emphasizing, perhaps even exaggerating, the wealth and decadence of screen stars. Everything about motion pictures came to give off an air of extravagance. The day-to-day lifestyles of the stars satisfied just about everyone's idea of a dream-come-true, and the movies themselves almost always ended in wish fulfillment for the protagonist. Exhibitors began to construct magnificent buildings to accentuate the glamorous image of motion pictures and give their patrons a taste of the high-life, if only for a couple hours.

Picture palaces were excessive, extravagant, lavish, superlative and wonderfully bizarre. It would be an injustice to attempt to describe even one of these magnificent edifices in the brief space that can be afforded here. It would also be beyond the scope necessary for this discussion. Ben Hall has written a thorough and charming account of these buildings in his book *The Best Remaining Seats*

(1961). Segments from his work, and others', are used below to provide the reader with a sense of the style and ambience of these motion picture cathedrals.

At no other time in the history of motion picture exhibition has the importance of setting to viewing experience been given greater attention than during the era of the picture palace. Audiences went out the theater to sit in the surroundings as much as to watch the movie:

The key to the success of the movie palace lay in the fact that the patron could for the small price of admission, not only see a moving picture, but also bask in the regal luxury of the surroundings. (Morrison, 1974 p.13)

The basic strategy behind the construction of picture palaces was, the more elaborate and ornate the theater, the more the appreciative the audience.

The first luxury movie theater, The Columbia Theater, opened in Detroit in October 1911. The Columbia had a seating capacity of a 1000, more than three times the capacity of the average nickelodeon (Morrison, 1974). In place of the usual pianist, an orchestra accompanied the action on the screen with a well-rehearsed, carefully composed score. The theater also boasted the city's first motion picture pipe organ which was played during intermission and, "in addition to the movie there were several acts of vaudeville presented on a fully equipped stage" (Ibid., p.9). The Columbia was such a immediate success that plans to build "exclusive and expensive" theaters in New York were well underway by early 1912.

A construction craze of picture palaces started with New York's The Regent which opened in 1913. This theater was designed by Thomas Lamb who is credited as, "the first major architect to make his name in movie theaters" (Hall, 1961, p.95). Lamb's designs served as the foundation for the "hard-top" or "standard" school of theater architecture. These theaters had their roots in opera houses and vaudeville theaters, but by the end of the decade they had far surpassed their predecessors in both style and grandeur (Hall, 1961).

A second school of theater design, founded by John Eberson, a European-trained architect, "borrowed from Nature and the more flamboyant landscape gardeners of the past" (Ibid., p.95). These types of theaters were known as "atmospherics" (Ibid.). Upon entering the main auditorium of an atmospheric, patrons would find themselves in a courtyard of a enormous Spanish villa, or an Oriental palace, or a French chateau. Whatever the scene it was always out-of-doors; that is, the interior walls of the auditorium were made up to look like the exterior walls of some wondrous edifice. The ceiling was the sky, studded with twinkling stars and friendly clouds. Just sitting in the fantasy world of an atmospheric must have been worth the price of admission:

The "atmospheric" was firmly rooted in the conviction that visual gimcrackery is the primary demand of the paying public and the more splendor and glitter that can be brought together to inspire an audience the better they will respond. (Sharp, 1969, p.74)

Eberson believed that the surroundings he created offered more than simply an aesthetic feast for the eyes. He felt that they had a persuasive affect on the audiences' sense of well-being. In speaking of his characteristic domed ceilings, Eberson has been quoted as follows:

We credit the deep azure blue of the Mediterranean sky with a therapeutic value, soothing the nerves and calming perturbing thoughts (cited in Sharp, 1969, p.74).

The theater primed the viewer for optimal reception of the entertainment to be presented on the stage and screen.

In both atmospherics and hard-top picture palaces patrons were treated like guests of royalty. Their personal comfort was attended to and all they needed to concern themselves with was enjoying the entertainment. One can only assume from the phenomenal popularity of these theaters, that the desired effect was achieved. By 1920 luxury movie theaters, some with seating capacities of up to 5000,

could be found all over North America (Sharp, 1969, p.74). The immense popularity of the picture palace, as with the nickelodeon before it, can be largely attributed to a lack of recreation alternatives. According to Ben Hall (1961), life in the Twenties was not nearly as roaring as some historians would have us believe:

It was before the day of the bowling craze, the cook-out, the home workshop, and the lures of go-now-pay-later vacations. The Pianola and the Victrola were limited by the number of reels and records in their cabinets; there was no television, and radio was, at best, a stay-at-home attraction. Only one family in ten owned an automobile. And yet people stirred - like lemmings - with an urge (to use a then popular phrase) to "go places and do things". (p.17)

The fantastical world of the picture palace permitted its patrons an opportunity to exercise their imaginations and escape the mundaneness of their daily existences. Ironically, the excesses of these theaters in terms of both size and ornamentation would eventually contribute to their collapse.

The Great Depression and the Second World War

Developers stopped building picture palaces as abruptly as they started when the market crashed in 1929. Fittingly, the last great movie palace, the "fabulous and foolish" Fox in San Francisco, was designed by Thomas Lamb, the architect first renowned for theater design (Sharp, 1969, p.82). Palaces continued to operate for many years, some for a decades, but no more were built. At first, no one could afford to build, or for that matter, even properly maintain a picture palace. Later on, when construction became an option again, investors were no longer willing to put money into such large and elaborate theaters. The Depression had changed public attitudes. The light-hearted optimism that had ushered motion pictures into the lives of the middle class had been replaced by guarded conservatism. People continued to go out to the movies, but the glamour of the picture palace made them

uncomfortable; perhaps, with the knowledge of poverty, the glitter had come to look foolish.

Craig Morrison (1974), film historian, puts forth the argument that the downfall of the picture palace was caused in part by advances in motion picture technology. He claims that high-tech production and projection equipment no longer fit in the old-world charm of the picture palace:

Flickering shadows accompanied by a symphony orchestra or a mighty pipe organ, had a quality of mystery and magic that was lost as sound and color came to the screen. Movies attained a realism that contrasted uncomfortably with the fantasy of the picture palace (p.15).

Movies were able stand on their own. Vaudeville acts and orchestras were no longer necessary; with them went the appeal of the elaborate ornamentation. In the new theaters "marble and gilt were replaced with painted concrete" (Morrison, 1974, p.15). Industry interests focused on the content of movies; where movies were viewed was assumed to be relatively unimportant. Fans, after all, came out to see the movie not admire the decor. Once considered fundamental to a theater's success, environmental factors were all but ignored. Indeed, even issues of basic comfort (leg room, seat cushions, air temperature) seemed to be neglected.

The first couple years of the Depression went by largely unnoticed by the film industry. Construction had stopped but there were still plenty of patrons for existing theaters. The backlash of the failed economy was delayed for a time by the novelty of sound (Balio, 1984a, p.225). Inevitably, the novelty wore off and fewer and fewer people splurged on a night out at the movies. To make matters worse, "talkies" cost at least twice as much to produce as silent films. In spite of reduced admission prices "average weekly attendance dropped an estimated eighty million in 1929 to sixty million in 1932 and 1933" (Balio, 1984a, p.256). By 1934, however, the worst was already over and all the major studios had begun to make money once

again (Ibid., p.260). In comparison to other areas of the economy, motion pictures survived the Depression relatively unscathed.

The second World War can be aptly characterized as the proverbial black cloud with a silver lining for the motion picture industry. Film rationing and the closing of foreign markets made prospects seem grim, but in the end these limitations would serve to strengthen the industry. The rationing of film resulted in the production of fewer movies of higher quality. Producers were quick to pick-up the fact that there was more money to be made from a few good films than from several mediocre ones. The opportunity for war-time profits was also heightened by economic and social conditions in the domestic marketplace:

Dollars were plentiful, while commodities were not. Movies were the most readily available form of entertainment. (Balio, 1984a, p.281)

Moreover, during these hard times people clamored for an opportunity to escape the cruel realities of war. The motion picture theater provided a temporary psychological shelter. Weekly attendance reached an all time high of ninety million in 1946 (Ibid.).

Post-war Trauma

The dramatic social, political and technological changes that followed in the wake of World War II had a terrific impact on motion picture theater attendance. In the decade following 1948, weekly attendance dropped by over fifty percent, from 90 million to around 40 million (DeFleur and Ball-Rokeach, 1983, p.63). Attendance would continue to decline for the next thirty years (Ibid.). Television is the most commonly cited cause of the decline; however, there were several other forces at play as well. In fact, the decline of the theater audience began before the wide-spread use of television (Balio, 1984b, p.401). While North America

celebrated peace and began to re-establish normalcy, the motion picture industry mourned the end of an era and reacted to attacks from all sides.

Politically, the movie industry battled on two fronts. At home they were under siege by the United States Department of Justice, Antitrust Division (Guback, 1987). Extensive vertical integration of the production, distribution, and exhibition components of the motion picture industry had secured for the major studios an airtight monopoly. Independent producers were at an enormous disadvantage in attempting to book screen time for their movies, at least in the better houses; likewise, independent exhibitors had a terrible time obtaining big-name movies. The United States government aimed to divorce production from exhibition and thereby open up the market to greater competition.

Legal action was first taken in July 1938 and was finally settled ten years later in favor of the prosecution:

Block-booking, the fixing of admission prices, unfair runs and clearances, and discriminatory pricing and purchasing arrangements favoring affiliated theater circuits were declared illegal restraints of trade and their future use by the eight defendants was prohibited. (Balio, 1984b, p.402)

The consequences of this landmark case for the movie viewing public were both positive and negative. On the positive side, the quality of motion pictures improved as a result of having to obtain screen time on the basis of their actual merit, rather than the name of their producers. Also, many of the less desirable theaters were forced to close down because, no longer supplied by the major studios, they were unable to remain financially viable. On the negative side, increased competition made it difficult for the better theaters to generate enough revenue to maintain their high over-head operations (Coughlan, 1951, p.102). Moreover, since every theater could bid for first-run, major star productions, there was never sufficient product to keep up with the demand. If a movie failed to draw crowds, exhibitors

were now in a position to simply dump it for something new, whereas before they were under an obligation to show it for a pre-determined amount of time.

Consequently, the same show could play at numerous theaters until something better came along. Needless to say, many movie fans quickly became bored with this arrangement and consequently, stopped patronizing theaters.

The industry's other political battle was for access to foreign markets. European nations, hard struck by the war and in need of many essential goods and services, were in no position to import American films. Moreover, they could not allow the U.S. film industry to march in and take over when their own film industries were in such a vulnerable state:

These countries had to protect themselves and their film industries not only from American pictures but also from the substantial drain on hard currency their exhibition entailed. (Guback, 1987, p.474)

At best, American film companies managed to secure future access to these markets by distributing films for minimal revenues and by contributing a large percentage of these revenues to the rebuilding of indigenous motion picture industries.

Back at home, the social climate struck another blow at theatrical exhibition. The end of the war meant the re-establishment of families and careers. Many veterans spent their time raising children and their money purchasing houses, appliances, automobiles and other domestic goods. Others enrolled in educational programs which limited both their disposable income and time. Still others invested their resources into new businesses. Some of these businesses catered to alternative leisure time pursuits, effectively increasing the competition for motion pictures. With the exception of movies, the leisure time market was still relatively untapped and enterprising entrepreneurs were quick exploit it.

The Introduction of Television

Television was, of course, the most threatening of the new leisure time alternatives to hit the marketplace after the war. The rate at which this new medium was adopted by consumers was staggering:

The number of sets in use soared by more than 1000 percent, from 14,000 in 1947 to 172,000 a year later. In 1949, the number went up to 1 million, 1950 to 4 million, an 1954 to 32 million. By the end of the fifties, nearly 90 percent of the homes in the United States had television sets. (Balio, 1985b, p.401)

Television had taken over as America's most popular past-time (Ibid.). Given the option, many amusement-seekers preferred to remain at home and box office revenues began to plummet. By 1951 gross theater receipts were reported as having declined anywhere from 15 to 40 percent, and yet the public was spending "over 20 percent more for entertainment" (Luther, 1951, p.165). Reactions from industry representatives were mixed.

There were those in the industry who did not see television as the archenemy of theatrical exhibition, at least not any more so than other leisure time options. Optimistic promoters thought that while increased competition would necessarily cause the market to become fragmented, theaters would be able to maintain a sufficient audience because they offered a unique product. Others claimed that television had nothing to do with the low attendance figures. Rather, they said it was the poor quality productions Hollywood kept churning out that was to blame. Still others took the position that television offered essentially the same product as theaters in a manner that was both more convenient and less expensive.

Benjamin Schlanger and William Hoffberg (1951), theater engineers and architecture consultants, were of the first perspective. They believed that there would always be a place for theatrical exhibition regardless of how popular

television proved to be. In 1951 they consoled theater owners with the following argument:

Although home television seems to be acquiring a mass audience, there will always be a motion picture theater and television theater audience consisting of those patrons who wish to see entertainment not available on other mediums, those who wish to avoid advertising intrusions, those desiring a respite from home environments, those satisfying their gregarious instincts, and those who prefer the dramatic impact of the large screen cinematography. (p.39)

They go on to recommend that theaters should be designed and renovated to highlight their strengths and accentuate the differences between theater and television viewing.

Those who held the opinion that the low quality of movies was responsible for the decline in attendance argued that the general public were becoming increasingly literate and had grown tired of the juvenile content of American movies (Coughlan, 1951; Mercey, 1947). This perspective offered an explanation for the increasingly small number of middle-aged patrons attending theaters. These conspicuously absent viewers came to be called "The Lost Audience":

People above the age of about 35, most of whom presumably were movie fans in earlier years but who, having arrived at maturity, found themselves no longer moved by the simple-minded stories which Hollywood mainly served up for entertainment. (Coughlan, 1951, p.102)

Television was not an issue, for if the lost audience felt that motion picture fare was poor they were unlikely to be terribly impressed with television programming.

Those in the industry who saw television as enemy of theatrical exhibition found real cause for alarm in October 1957. It was at this time that most of the major studios finally agreed to lease pre-1948 motion pictures to television stations. A study conducted one year later by an independent research firm for the Theater

Owners of America, lent evidence to the position that television was stealing theater audiences:

The report states that since last September, motion pictures on tv command one-quarter of the total of the nation's viewing time and the public spends four times more hours a week looking at old movies on tv than seeing new ones in theaters. As a result, the report claims, there was a 7 million decrease in average weekly movie attendance in the final quarter of 1957, compared to the same period in 1956. ("Study blames TV," 1958, p.58)

In support of the "Lost Audience" argument, Samuel Goldwyn, a leading independent producer, denounced the conclusions drawn from the report:

Good pictures on television do not keep people away from the theaters. It's bad pictures [in theaters] that keeps them away. (cited in Ibid., p.58)

In an effort to differentiate their product from television programming, moviemakers experimented with a number of innovations throughout the fifties. For example, many more movies were produced in color during the first half of the decade: "The percentage of features produced in color jumped from around 20 to more than 50 percent of total domestic output" (Balio, 1985b, p.425). Fewer color pictures were released in the latter part of the decade, presumably because the novelty had worn off and producers became skeptical whether color was worth the extra investment (Ibid., p.427). However, by the early sixties nearly all Hollywood productions would be in color. What was once novel was now the standard and theater patrons simply expected color productions. Television would convert to color broadcasting in 1965.

Theater owners also experimented with projection techniques designed to enhance the effects of large screen exhibition. In particular, there was 3-D, Cinerama, and Cinescope (Balio, 1985b, p.429). 3-D motion pictures produced an illusion of depth on the two dimensional screen. Cinerama "created a sense of

depth by projecting an image in three segments on a broad curved screen" (Ibid., p.427). For a short time both Cinerama and 3-D were immensely successful. However, they both were plagued with high production costs, and the need for expensive, specialized projection equipment. Moreover, they were received by the viewing audience as fads; quick to become popular and just as quick to become old news. The Cinemascope turned out to be a more practical and durable scheme for exploiting large-screen exhibition.

The Cinemascope employs a specialized lens developed by Henri Chretien, which permits a camera to, "compress a picture image horizontally" (Balio, 1985b, p.430). Further along in the exhibition process "a 'compensating' projector could stretch [the picture] out on the screen" (Ibid). The Cinemascope was a more cost-effective means of improving theatrical exhibition than either 3-D or Cinerama on several accounts:

First of all, the lens could be fitted on existing equipment; second, less manpower would be needed on the set and in the projection booth; and third, the costs of converting theaters for projection would be modest, anywhere from \$5,000 to \$25,000. (Balio, 1985b, p.431)

Twentieth Century Fox was the first studio to promote the Cinemascope. They ran into difficulty however, when exhibitors hesitated in converting their operations for fear there would not be enough product once the necessary projection equipment was in place. Fox decided to make the device available to any interested production companies in an attempt to gain exhibitors confidence (Ibid., p.431). Many production companies were quick to capitalize on the opportunity, the rest soon followed suit either by adopting the Cinescope or developing their own technology to accomplish the same effect.

With the wide-screen format and accompanying stereo sound systems came a new strategy in movie production, the "block-buster" ("Getting them back," 1955).

To make full use of the new technology, producers began to concentrate their

efforts on big-budget movies. Movies with long sweeping panoramic shots of exotic landscapes, with huge casts, and detailed and elaborate sets became very popular. The idea was to offer viewers an experience they could not achieve with television. To a certain extent the strategy would prove successful; however when a movie died at the box office it would set a studio back millions of dollars. This problem would be considerably lessened in the mid-1970s when in-home viewing alternatives provided moviemakers access to a large secondary market.

The Seventies and Eighties

The early 1970s was a period of relative calm for motion picture exhibitors. For the most part, they had survived network television and future challengers, such as videocassette players, had not matured enough yet to be considered dangerous (Guback, 1987). The steady decline in weekly theater attendance which began in the early 1950s finally appeared to be tapering off (DeFleur and Ball-Rokeach, 1983). While attendance was a far cry from the golden era of the 1940s, hovering around 16 million as compared to 90 million, it had at least stopped dropping. In the early 1970s, theaters still had certain advantages over television. For example, theaters were guaranteed a three year grace period between a movie's first theatrical release and its airing on television. Today, however, they no longer hold this privilege:

In the early 1970s, they [exhibitors] could still be confident that a film would not appear on network television until three years or more after its theatrical release. Pay-tv cut that period in half, and home video cut in half again. Pay-per-view could offer pictures simultaneously with theaters. (Guback, 1987, p.76)

Indeed, the movie *The Pirates of Penzance* was released by Universal studios simultaneously to theaters and pay-tv on February 18, 1983 (Austin, 1986, p.104). Other studios have been experimenting with early videocassette releases (Ibid.). Currently, a typical motion picture has the following "life-cycle":

About four months after a film hits the theaters, it is available on video tapes and discs for home viewing. About eight months later it pops up on pay cable systems such as Time Inc.'s HBO, and a year later it finally ends up on network television. ("Sunny skies ahead," 1983, p.47)

Release tactics will undoubtedly continue to change as production and distribution companies adjust to maximize the potential revenues from each viewing alternative. According to a report by *Business Week*, box office revenues accounted for 80 percent of a typical film's revenues back in 1978; by 1982, the year the report was published, theatrical revenue had dropped to around 59 percent of total revenues ("How TV is," 1983, p.78). The president of Economic Information Systems at that time, Jay M. Gould, is reported as having projected that, "by 1990 domestic theater attendance could drop more than 50% to about 500 million" ("How TV is," 1983, p.78). He felt that this would force producers to turn to nontheatrical markets for more than half of their revenues (Ibid.). It would turn out that Gould was mistaken on the first account but correct on the second. Attendance has not dropped, in fact revenues from the box office have been setting records in recent years. It is true, however, that revenues from this source have slipped to below the 50 percent mark for the industry as a whole:

Ticket sales reached \$4.2 billion last year, making the 1987 box office the best in Hollywood's history. Revenues from videocassettes were even higher. (Harmetz, 1988, sec.2 p.1)

The upshot of all this is that the moviemakers are making more money than ever before. Caution must be exercised in interpreting the meaning of these figures though. As Thomas Guback (1987) points out in his very informative article on the motion picture theater business in the 1980s, box office revenues in terms of real dollars is far less impressive:

For example, in 1984 the gross box office was \$4.030 billion - the first time it exceeded \$4 billion. But when

that figure is deflated according to the Consumer Price Index, its value in 1977 dollars becomes \$2.351, somewhat less than the actual 1977 gross box office of \$2.372 billion. (Guback, 1987, p.62-63)

When inflation is accounted for, it becomes clear that box office revenues have remained relatively constant over the past decade. Any additional profits being made in the industry are coming from the new viewing alternatives. Needless to say, theatrical exhibition is not on the receiving end of these new resources. The role of the theater in the motion picture industry is becoming more narrowly defined all the time. Once a vital component, theaters are becoming increasingly expendable to the financial viability of motion pictures.

The past few years have shown modest increases in attendance rates; in 1984 weekly attendance reached 23 million, however, by 1986 it was down again to about 19.5 million (Guback, 1987). The statistics vary from source to source (as with most areas of the industry) but one thing is certain: even modest gains when compared to U.S. population growth over the past 25 years, "179.3 million in 1960 to 240.5 million in early 1986" (Guback, 1987, p.62), has meant an ever-increasing decline in moviegoers. This loss is even greater than the figures suggest when you consider, that the core market for theater attendance, the 12- to 24-year olds, increased in number from 27.3 million in 1960 to 44.1 million in 1984 (Ibid., p.62). The situation will likely worsen as the young adult population declines again over the next decade (Harmetz, 1988; "Movie theaters head," 1986). This segment of the population has been vital to theater exhibition because it places very high value on a particular aspect of the motion picture viewing experience that in-home alternatives will never be able to provide, namely, the opportunity to get out of the house. There is a tendency in our society to become more home-oriented with age (Austin, 1986). It can be expected, therefore, that many of the current moviegoers will curtail their theater attendance as they approach middle-age.

The relatively constant annual attendance rates in the face of the growing population, the stagnant box office revenues, and the growing popularity of in-home viewing alternatives have given rise to some very discouraging predictions as to the future of theatrical exhibition of motion pictures. Communication theorists, Melvin DeFleur and Sandra Ball-Rokeach (1983), for example, reviewed the development of motion picture theater attendance and came to the following conclusion:

The most logical projection for the future would be that the decline [in attendance] will continue, and that the movie theater as we know it will disappear. (p.65)

Over the years some exhibitors have taken measures to prevent such grim predictions from being realized. Others have ignored the doomsayers on the grounds that previous threats have failed to bring down the industry and that theatrical exhibition has become deeply ingrained in the social fabric of our society.

In the 1970s many exhibitors sought to regain customers and reduce costs by dividing up their large theaters into three or four smaller cinemas sharing a lobby, concession area, washrooms, and box office ("Movie theaters head," 1986). The main advantages of the "multiplex" design were "economies of scale for operators and a wider choice for consumers" ("Movie screens are popping," 1984, p.76). Since that time the multiscreen theater has become the norm. The wide-spread development of multiscreen theaters can be singularly attributed to their financial success:

The remodeling of theaters into multiscreen establishments has been spurred by exhibitors' imperatives to spread costs over a larger number of pictures. Converting a large single-screen auditorium to a duplex or triples not only reduces unused seating capacity, it also offers the exhibitor a greater chance to book a potentially profitable picture. As well, it increases the number of patrons who come into contact with the concession stand. (Guback, 1987, p.65)

Any gains that can be attributed to the multiplex must be weighed against negative audience reactions. Many of these cinemas were quite cheaply constructed. Sound-proofing between auditoriums can be so poor that patrons can pick up on the plot of the movie next door; the screens can be very small, the seats hard, and the sound systems, tinny.

The appeal of in-home viewing alternatives may be attributable to more than just greater comfort and convenience. It may well be that when compared to home environments, the theater environment is perceived as actually unpleasant. A study conducted by the National Association of Theater Owners in 1974, and reported by *Variety*, a well known entertainment trade journal, found that theater patrons held the following complaints:

Seats are too small Prices too high Theaters are dirty Popcorn is stale, butter rancid Theaters are either too hot, or too cold Audiences are too noisy (cited in "Why folks go," 1974, p.7).

In May 1977, Variety reported on a Gallup poll of some 1,761 persons throughout the United States. The results indicated that, "the majority of those quizzed expressed a preference for viewing films on the home tube or prospectively on other technologies" (cited in "Gallup check," 1977, p.13). To be fair, those polled did not have many complaints about theaters, they simply rather view at home. A survey conducted by the allied Theater Equipment Association (TEA) in 1981, found that people avoid theaters primarily because of, "unappealing subject matter of the film on view, contrasting ease of staying home and taking their film viewing in comfort" (cited in "Dailies fuel exhib," 1981, p.5). In addition the survey reported that a full third of respondents indicated admission costs as a "stay-away motivation" (Ibid.). In presenting their results at a three day industry convention, TEA representatives were reported as repeatedly stressing the need for improved, more comfortable,

better equipped theaters with larger screens (Ibid., p.32). Another study presented at the same convention found that, "increasing numbers of film-goers are exercising the option to see motion pictures at home on cable tv, subscription tv and videocassette players" (cited in "Film subject looms," 1981, p.5). The study conducted by the Newspaper Advertising Bureau, surveyed 1,500 adults in the U.S. and Canada. At that time, only 8 percent of Canadians had a videocassette player, 5 percent had subscription television, and 53 percent had cable television (Ibid.). As penetration levels increased so did the number of would-be theater-goers who opted for stay-at-home viewing.

The attractiveness of in-home viewing settings may have been enhanced by the relative homeliness of early multiplex theaters. This argument has been developed by Bruce Austin, a communication scholar well known for his research on audiences' motivations and expectations (for example, see Austin, 1981). Basic to his discussion is the notion that exhibitors may have inadvertently encouraged theater patrons to adopt in-home viewing alternatives by altering their expectations and ways of thinking about motion pictures:

Along with the multiplexes came a diminished screen size which nurtured an audience that may conceive of and be accustomed to the movie experience as virtually identical in form to television - albeit without commercial interruption. When Home Box Office was initiated in 1975, and as it attracted more and more subscribers, movies on the small screen became the movie experience for many. The excitement and specialness engendered by the large screen format may well become extinct. (Austin, 1986, p.87)

The psychological leap from large screen to television viewing may have been bridged by the small screen multiplexes first introduced in the 1970s. Recently, a number of exhibitors attempted to revive the specialness of large-screen viewing.

The example of Charlie Chick, founder and president of Presidio Enterprises Inc. has undoubtedly served as an inspiration to others in the industry. Presidio is a very small operation with only three theater complexes in the Austin, Texas area. The most famous of these is the Arbour Cinema Four situated just on the outskirts of town. Although the market for this area is only the 98th largest in the U.S., and the seating capacity at the Arbour is only 1,387 patrons, "it has placed in the top 10 grossing theaters in America since it opened in June 1985" (Hartman, 1986, p.103). What makes the Arbour so popular?

Each of the Arbour's four auditoriums are equipped with screens about 50 feet wide and one of the most sophisticated sound systems available, George Lucas's THX system. In addition, the Arbour offers luxurious imported seats and 3 inches more leg room than most theaters. Perhaps the most alluring quality of the Arbour is its "atmospheric" style lobby:

Rather than a ceiling at the Arbour there is an evening sky with twinkling stars and puffy clouds. An audio tape of thunder and lightening plays every five minutes. A two story tower clock rises over the concession stand, decorated with festive red and white candy-striped awning. Antique-style lamp posts mark the way past the prewar British telephone booth and into the auditoriums. (Hartman, 1986, p.105)

People will drive out of their way, past shopping mall multiplexes, to the edge of town to see a movie at the Arbour. Charlie Chick has succeeded in putting the magic back into a night out at the movies.

Garth Drabinsky, founder and chief executive officer of Cineplex Odeon, one of the largest theater chains in North America, shares Chick's enthusiasm for elaborate theater design (although their tastes differ substantially). Cineplex's great success has been attributed to Drabinsky's innate understanding of the expectations of movie-goers:

[He has a] showman's instinct that movie goers, like restaurant clients and department store shoppers, come to entertained by the environment as much as to buy the goods. (Black, 1986, pp. 92,94)

The new Cineplex Odeon theaters reportedly cost around \$2.75 million to build, that amounts to about a million more than standard, "no-frills six screen theater" (Ibid., p.94). These theaters conform to the traditional "hard-top" or "standard" school of theater design:

Gleaming granite-floored lobbies with original murals on pastel walls and clean, spacious auditoriums with comfortable seats and first-rate sound and projection. (Sherman, 1986, p.93)

Some of his complexes even have small cafes adjoining the concession stand where patrons can enjoy a cappuccino and a croissant before the show. Not all of the new theaters are quite as elaborate as those described above, but nonetheless a renewed respect for the role of setting in the viewing experience can be found throughout the industry.

Construction of new theaters has been booming over the past ten years. In 1976, there were 12,197 indoor motion picture screens operating in North America; by 1986 there were 19,947 (Guback, 1987, p.68). More recent statistics puts the figure at 22,721, the greatest quantity of screens since 1948 (Harmetz, 1988). Why are people building theaters when all indications suggest a further decline in attendance? According to Thomas Guback, most new theaters are built by real estate developers as part of larger shopping complexes and are leased to exhibitors. Consequently, there is minimal capital investment for exhibitor; even the cost of market research testing the viability of a new theater complex in the district is covered by the developer. Sometimes theater chains will sign leasing agreements just to keep competitors from closing in on the territory:

Contributing to the growing numbers of screens in many communities is the desire on the part of come circuits to maintain or increase market power over competing chains in the same locale. (Guback, 1987, p.70)

Whatever their motives, one can safely assume that exhibitors would not continue expanding if they thought they were going to lose money.

Bruce Austin has suggested that the growing number of screens reflects a "confidence that theatrical exhibition will remain viable" (1986, p.104). There are a few good reasons why exhibitors might feel secure about the future. First of all, inhome viewing technologies depend on theaters to advertise their products for them before they enter the market. As things stand, the value of a motion picture on videocassette or pay-tv is largely determined by its success at the box office. More to the point, if a movie does not play in a theater its chances of making any money in these other markets are next to nothing (Harmetz, 1988; Taub, 1983). Moreover, production companies have increased their output in recent years mostly in response to the new in-home market. Moviemakers are more willing to take risks now than ever before because if a movie dies at the box office they still have a chance to recoup their investment through videocassettes and pay-tv (Harmetz, 1988; Taub, 1983). Exhibitors can only benefit from the situation; if a movie does not draw crowds, they can quickly drop it for something better ("Movie screens are popping," 1984). Unfortunately for the studios, and sometimes the fans, movies that are slow taking off are never given an opportunity to build an audience (Ibid.). Major production and distribution companies have begun to buy up theaters in an effort to take back control over the exhibition of their products:

The major studios - and even some of the minor ones - intend to make and distribute movies, show them in their own theaters, manufacture and sell videocassettes six months later, then syndicate their films to their own television stations, bypassing the networks, and, in the case of Disney, play them on a studio-owned pay cable channel. (Harmetz, 1988, sec.2 p.29)

Efforts in this direction have met with no resistance on the part of the U.S. Department of Justice, even though they prosecuted the studios for the same action back in 1948. In fact, in 1984 the Department of Justice, "offered to support the

studios if they sued to get back into the business" (Sherman, 1986, p.94). This may cause some independent exhibitors to worry about going out of business, but for motion picture theaters in general, it practically guarantees a long and healthy life. Should the studios manage to control all sectors of the business, theaters will not have to contend with unregulated competition. Movies will be exploited to achieve maximum profits from each delivery system. Since all revenues would ultimately end up in a single purse, industry energies would be concentrated on stealing audiences from other studios, rather than other delivery systems.

Research in the Age of In-home Viewing Alternatives

Whether in-home viewing technologies are actually responsible for declining attendance rates has never actually been conclusively established. Research in this area to date is inconclusive. The difficulty that arises in trying to resolve this issue is that there are numerous changes occurring simultaneously:

While earlier changes, such as the introduction of "movies in the home" (TV) conveniently occurred one at a time - and with temporal breathing spells of some duration in between - such is not the case at present. The industry is now confronted with the confluence of multiple technological changes and innovations which may have significant impact on all other components of the industry. (Austin, 1986, p.80)

Efforts to measure the effects of in-home technologies on theater attendance become out-dated very quickly as penetration levels increase and usage patterns change with the length of ownership and the adoption or discontinuance of other technologies.

In place of measures that simply attempt to document the changes occurring in the marketplace (in terms of numbers of videocassette players being sold and numbers of hours spent viewing rented videocassettes versus hours spent in theater attendance, etcetera) researchers should concentrate on measures that deliver some insight into the character of the changes (in terms of how audience's motivations,

expectations, behaviors, and reactions give rise to changes in media use). This type of information may have greater predictive powers in that it is proactive, meaning the information will likely be applicable to future viewing events; the basic differences between theater and in-home viewing will probably remain fairly stable. On the other hand, information from reactive sources, such as the present-at-the-time-of-measurement penetration level of videocassette players, will most likely change. Therefore projections based on this type of information are less reliable.

The present research represents an attempt to measure fundamental qualities of the movie viewing experience in two distinct settings. While the results may be limited to a narrowly defined sample population and movie type, they are expected to reflect enduring patterns of behavior. It is hoped that this research will serve as a foundation for further studies investigating the nature of the motion picture viewing experience.

Chapter 3

Theoretical Considerations

The problem of measuring the influence of environmental variables on the reception of media messages has gone largely unexplored by communication scholars. Typically, in approaching a media problem theorists will focus on either the source of the message, the receiver of the message or the text (content) of the message (McQuail 1987).

Environmental factors can have an impact at every stage in the communication process. The psychological state of a sender, his motivations, intentions and attitudes can be influenced by his immediate surroundings which, in turn, can determine the content of the message. If one can believe the popular account of the discovery, or rather the conceptualization, of gravity when Sir Isaac Newton is hit on the head by a falling apple, then one should be able to appreciate the importance of setting in the formulation of ideas. In addition, the context in which a source constructs his message may influence its mode of expression; For instance, an artist inspired by the bleakness of a landscape may chose to employ large empty spaces and shades of grey to convey his observations on the senselessness of life to others. The environment in which a message is received can also influence a receiver's interpretation of its meaning. Prolonged eye contact with a stranger can either be a threat or a compliment depending upon the circumstances. Very often we seek clues from our surroundings to aid us in interpreting the meaning and appropriateness of other people's words and actions. This research project focuses on this last issue; the effect(s) of environmental variables on receivers' interpretation and appreciation of media messages. In particular, the impact of setting on the motion picture viewing experience is investigated. The present chapter attempts to provide the reader with a review of

theoretical postulations relevant to the problem of audience reactions and motion picture viewing environments.

Mauerhofer: The Psychology of the Film Experience

Critical to the event of movie-going is the effect of theater design. Briefly, the seating and lighting arrangements in theaters are typically constructed to discourage interaction amongst patrons and direct attention to the screen. The effects of these artifices are discussed at length in an article by Hugo Mauerhofer entitled *The psychology of film experience* (1949). This article was conceived and written prior to the development of alternative viewing environments. Accordingly, Mauerhofer's analysis of the "film experience" is descriptive only of today's theater environment. Mauerhofer coined the label the "Cinema Situation" to describe the "everyday act of cinema-going". The essential postulate of his analysis is that the contrived environment of the cinema causes audience members to undergo a "decisive psychological change in consciousness" (1949, p.103).

Mauerhofer's thesis evolves from the concept that in the absence of any extraneous aural or visual stimuli, that is, any sound or light from sources other than the motion picture screen or speaker system, audience members will experience an alteration in their sense of time and of space. This alteration is believed to occur whenever we remain in a darkened room for a significant amount of time. Our sense of time is changed such that "the course of ordinary happenings appears retarded" (Ibid., p.104). This perspective heightens our potential for feeling bored which in turn awakens a "desire for intensified action" (Ibid., p.105, emphasis in original). Concurrently, the darkness lessens our perceptual capacity to judge space. We find difficulty in discerning the size and shape of objects in our environment. Mauerhofer claims this disability gives "greater scope to the imagination in interpreting the world around us" (Ibid., p.104). These changes in perspective, combined with the voluntary passivity of motion picture theater patrons, cause "the

unconscious to begin to communicate with the conscious to a higher degree than in the normal state" (Ibid., p.106). Consequently, our reception of the motion picture is influenced by the "Cinema Situation".

If Mauerhofer's analysis is correct it would be reasonable to assume that the viewing experience would lose something in the in-home television/videocassette player (VCR) environment:

The perfect enjoyment of cinema-going is restricted by any visual or aural disturbance, for it reminds the spectator, against his will, that he has just been about to elicit a special experience by excluding the banal reality of everyday life. (Mauerhofer, 1949, p.p.103-104)

There is one other element to the "Cinema Situation" which contributes to the experience of film, namely, the viewers' status of "anonymity". This chosen isolation "guides the spectator into his most private sphere" (Ibid., p.108) allowing for uncritical identification with the film's characters and indirectly, its makers.

Mauerhofer's analysis is one of very few studies to directly address the impact of environmental factors on the motion picture viewing experience. Although dated, it raises some interesting questions concerning the viewing experience in today's multi-media world: Does the less-than-ideal, in-home viewing environment greatly detract from the experience, or does it simply modify it; do inhome audience members make psychological compensations for inadequate contextual inspiration? These are some of the questions considered in this research project.

McLuhan: Hot Film - Cool Television

Marshall McLuhan, the most famous of media scholars, was not terribly concerned with the effects of media content on audience behavior. He believed more useful information could be gained by examining the underlying nature of different media and how they shape the structure of public and private thought

processes. Something of an intellectual radical, during a period when communications technology was developing with unprecedented rapidity, McLuhan put forth unconventional, progressive and sometimes rather convoluted theses about media. To describe his views on movie theaters and television, it is necessary to first review his concepts of "hot" and "cool" media.

A hot medium is one that is heavily loaded with information to be processed by our perceptual and cognitive systems; a cool medium is one which is relatively sparing in the provision of information. In a sense, cool media provide incomplete data, requiring us to exercise our cognitive faculties to a greater extent than hot media: "Hot media are, therefore, low in participation, and cool media are high in participation" (McLuhan, 1967, p.36).

The content of media is considered simply another form of media and of little consequence other than acting as a distraction which only serves to enhance the effect of the vehicular medium:

The content of a movie is a novel or a play or an opera. The effect of the movie form is not related to its program content". (Ibid., p.32)

In other words, the story which makes up a motion picture has no effect on the movie viewing experience. It is the medium itself that is the influential agent in the consumers' experience.

According to McLuhan's typology, television is a cool medium relative to the hot medium of film (Ibid., p.36). Television only provides "low definition" or incomplete information in that the technical inferiority of the medium produces less refined visual and aural stimulation. In response to such stimulation the observer/listener must fill-in-the-blanks requiring, presumably, a deeper level of cognitive involvement: "A cool medium like TV, when really used, demands this involvement in process" (Ibid., p.43). In contrast, "the effect of hot media treatment cannot include much empathy or participation at any time" (Ibid., p.43). McLuhan

never actually defines what he means by "really using" a medium. It is assumed that he is referring to the amount of effort exerted in processing the program content. With television our program options are limited, we have limited control over the scheduling of programs, and no control over the sequencing of events within a program. With videocassette recorders, on the other hand, we have the capacity to control all these aspects of any given viewing event. Greater potential control over a medium implies greater potential involvement with the medium. Therefore, videocassette players could be described as being even cooler than television in that the audience plays an even greater role in the consumption of the media product.

McLuhan makes the argument that the effect of the movie form is not related to its content. He does not, however, address whether the effect of the movie content, as it is perceived by an audience, is related to the form (i.e. film or video). One may arrive at the conclusion in reviewing McLuhan's views that movie content does not have an effect. Yet if the content of movie is itself another medium, as McLuhan claims, then it should have some effect on the audience albeit unrelated to the movie form. The fact that audiences will react (e.g. tears or laughter) to the content of a movie offers evidence of this effect. To determine whether the effect of the content medium, the story, is related to the delivery medium, film or video, is the objective of this research.

Principles of Information Processing

By relating McLuhan's thesis to principles of consciousness and attention in the field of cognitive psychology, one can interpret how media form may effect the experience of media content. Since the early 1970's cognitive psychologists have given considerable attention to the concepts of "processing capacity" and "attentional limits" (Lachman, Lachman, and Butterfield, 1979). These terms refer to the idea that our perceptual/cognitive systems are composed of a limited number

of processing resources, and that these resources are allocated according to need and availability.

This is compatible with McLuhan's analysis if audience "involvement" or "participation" is equated with processing requirements. Cool media would require a greater allocation of processing resources than would hot media. The more resources required the more difficult and lengthy the processing task. This would account for why in theater settings, which have minimal cognitive resource requirements, the viewer's reaction to content occurs almost automatically:

The transfer of the viewer from one world, his own, to another, the world created by film, ... happens so completely, that those undergoing the experience accept it subliminally and without critical awareness. (McLuhan, 1964 p.249)

The task of processing film is less demanding than that of processing television or video, therefore occurring automatically. This may also account for McLuhan's observation that film audiences are more critically discerning of program content then are live theater and television audiences:

The stage and TV can make do with very rough approximations, because they offer an image of low definition that evades detailed scrutiny. (Ibid., p.252)

The allocation of limited attentional resources to processing necessarily reduces the number of resources available for qualitative evaluation of content features. If television processing requires more resources than theater processing than theater viewers will have more resources available to put towards critical evaluation, whereas, television viewers will have engaged most of their resources simply in processing the content. In this sense we might infer that media form is related to the effect of program content.

Mehrabian: Three Basic Emotional Dimensions

Unlike McLuhan, who minimizes the importance of content, environmental psychologist Albert Mehrabian treats both content and context as influential factors in the motion picture viewing experience. Mehrabian does not provide any empirical evidence, rather he applies the constructs of a theoretical framework to a variety of environments including movie theaters and television settings. The crux of his argument lies in the following proposition:

People react to enormously varied environments in terms of a few basic emotional dimensions, and that these basic emotional dimensions can in turn produce enormously varied kinds of behavior. (Mehrabian, 1976, p.18)

According to Mehrabian there are three basic emotional dimensions: pleasure-displeasure, arousal-nonarousal, and dominance-submissiveness. These dimensions are thought to be independent of each other, meaning that the quality of one dimension cannot be predicted on the basis of knowledge of another. In addition, it is postulated that every known emotional state, however complex, is a unique combination of these dimensions.

Mehrabian applies his theoretical constructs to the physical settings of theaters and televisions/VCRs environments. On the emotional dimension of arousal-nonarousal, a visit to a theater is seen as more potent; "a theater represents a change from a private to a public environment, which is usually arousing in itself" (Ibid., p.208). Heightened arousal in the theater setting is also attributed to the following:

The size of the screen, the manner in which one's attention is focused on it; the presence of a crowd of strangers which heightens emotional sensitivity and expression; the variable, possibly new, setting represented by a particular theater; the change in daily routines and environments involved in simply getting to and from the movie house; and finally the gamble represented by paying beforehand for something we may not like. (Ibid., p.210)

Television, on the other hand, is thought of as less arousing, in part because it is usually a familiar stimulus in a familiar environment. Degree of arousal may be vital to the viewing experience in that high arousal would presumably provide for higher attention levels. The more attention we give a movie, to an optimal level, the greater our capacity to derive meaning from its plot, characters, and setting. In addition to greater attention, high arousal levels may also incite more intense emotional reactivity, so that a movie sequence that seems moderately funny at home may seem "side-splitting" in a theater.

With respect to the dominance-submissiveness dimension, people are generally expected to demonstrate greater perceived freedom and control at home than in a theater (Ibid., p.209). In the TV setting audience members can engage in a variety of activities simultaneously. Moreover, they can adjust the color and sound quality of the stimulus to suit their personal preference. Theater settings, on the other hand, restrict freedom of choice and movement. Such control is relinquished voluntarily by audience members rendering them more passive in their reception of movie content.

On the pleasure-displeasure dimension Mehrabian gives the TV/VCR setting the clear advantage. The higher pleasure levels associated with television can be largely attributed to the comforts and conveniences of private residences. Perceived pleasure and approach behavior have a high positive correlation, meaning that people will be attracted to places they perceive as having high pleasure potential. This implies that would-be theater-goers may be lost to the appeal of the television environment. Moreover, Mehrabian's theory also suggests that "in a pleasant environment people are able to tolerate more, not less, arousal" (Ibid., p.211). This statement seems to contradict Mehrabian's initial premise that the basic emotional dimensions function independently. If in pleasant environments occupants are able to tolerate higher levels of arousal, then it would be reasonable

to assume an interaction between pleasantness and arousal measures. No explanation for this apparent inconsistency in Mehrabian's work was found.

The framework of the three basic emotional dimensions has been applied directly to the motion picture viewing situation in a study conducted by Mitchell Shapiro and Thompson Biggers (1985). Their study investigates "the usefulness of relating motion picture preferences to emotion-eliciting qualities" (Ibid., p.5) in the viewing situation. Motivation to explore this problem came from an earlier study by W.G. Christ and T. Biggers (1984) which demonstrated that television program evaluations could be fruitfully analyzed in terms of the basic emotional dimensions.

Participants in the Shapiro and Biggers study were recruited from patrons at a University cinema. Patrons were approached upon entering the lobby of the theater and asked if they would be willing to participate. Those who consented were given a questionnaire which contained 24 bipolar adjective scales designed to measure emotional response to film. Participants based their responses to the questionnaire on the film they viewed that evening. Completed questionnaires were collected in the lobby shortly after the film was over. The data collection took place over a two month period. The results showed general agreement with the earlier television study:

Audience emotional response to a motion picture can be explained in large part by three factors: arousal, pleasure, and dominance. (Shapiro and Biggers, 1985 p.9)

However, the results also diverged from the television study in one important aspect. The earlier study suggested that the pleasure-displeasure dimension was the most important factor in accounting for audience reaction to television programs, whereas, the theater study suggested the degree of arousal as the most important factor. The authors believed that the physical effort exerted in attending a theater was responsible for this difference:

One must be more aroused to view a motion picture than a television program because movie viewing requires more effort - one must physically "go to" a theater to view a motion picture, whereas, all one need do is turn on a television set at home to watch a television program. (Ibid., p.9)

One important implication raised by these studies is that motion pictures viewed on television may not produce the same affective reaction in viewers as motion pictures viewed in theaters, however, no firm conclusions can be drawn because the viewing content differed between the studies. To make meaningful comparisons across settings, similar types of programming would have to be used in both settings. Another shortcoming of these studies is the exclusion of any measurement of the participants' evaluation of their environment. Without this type of information audience reaction can not be confidently attributed to situational factors. In other words, there may be qualities particular to the different viewing environments that give rise to audiences' emotional states and in turn, their evaluation of the program content. Shapiro and Biggers mention the physical effort involved in attending a theater, but this is only one of many situational factors that may contribute to an audiences' affective response. Mehrabian's descriptive analysis of motion picture theaters and television settings, as reviewed earlier, implicates several other environmental factors that may influence an audience's evaluation of a motion · picture as well.

It is important to remember in discussing movie environments, that the content of any given movie will undoubtedly carry the greatest influence on viewers' evaluations of their experience. No matter how pleasant a setting may be, overly arousing or unpleasant content (e.g. prolonged senseless brutal violence) will give rise to negative evaluations. However, by presenting the same content in distinctly different environments and measuring viewers' reactions, it may be possible to determine whether setting has a substantial effect on the viewing experience. If the

answer is the affirmative, then to what elements of the environment can this difference be attributed? To answer this question the settings must be broken down into distinct units of analysis.

The Transactional View of Settings

For the purpose of appraising the impact of environmental variables on audiences' evaluations of movies, the Transactional View of Settings proposed by Daniel Stokols and Sally Ann Shumaker (1981) has been adopted as a framework for this thesis. This framework, which offers a strategy for systematically classifying and discussing settings, is characterized by its "explicit consideration to the concept of 'place' - the geographical and architectural context of behavior", its emphasis on "the reciprocal influence between people and places", and its classification of settings as "oriented toward and occupied by single individuals, coacting aggregates, and/or interactive groups" (Stokols and Shumaker, 1981, p.442).

Settings are initially broken down along two fundamental dimensions: their physical and social context (sociophysical milieu) and their occupants. The sociophysical milieu of a setting is appraised in terms of the meanings ascribed to it by its occupants. These collectively held meanings are categorized into three types: functional, motivational, and evaluative. Functional meanings of a place are defined as follows:

Individual - or group - specific activities that occur within places on a regular basis, the norms associated with these activities, as well as descriptive information regarding the identities and social roles of setting members. (Ibid., p.447)

Motivational meanings are based on "personal and collective goals and purposes, each of which is weighted by its relative importance to the inhabitants" (Ibid., p.447). Evaluative meanings are simply subjective judgments by occupants of the physical and social properties of a place, including fellow occupants. Evaluative, functional

and motivational meanings when combined make up the "perceived social field" of a place.

Some places will understandably be described as carrying deeper meaning than others. The extent to which a place evokes "vivid and collectively held social meanings among the occupants or users" is defined by its level of "social imageability" (Ibid., p.446). Places that are characterized by patterned activity, that is they are regularly occupied, will presumably have higher social imageability than those characterized by nonpatterned activity, irregularly occupied or unoccupied, places.

The environments of concern in this study, television/VCR and movie theater settings, are both pattern activity places. Under this broad category, Stokols and Shumaker differentiate three possible orientations of places: individual, aggregate, and group. Their rationale for structuring the taxonomy in this manner is that "it provides transactional terms for describing environments that reflect the linkages between physical and social-structural features of place" (Ibid., p.450). Individual-oriented places are, as the label implies, normally occupied by a singe individual. Examples include bathrooms in private residences, fitting rooms in clothing stores, etc.. Aggregate-oriented places are occupied by "collectivities comprised of strangers or minimally related people" (Ibid., p.450). A motion picture theater is an aggregate-oriented place. Finally, group-oriented places are usually occupied by people who are well acquainted and have regular contact with each other. This type of environment is designed for the interaction of organized groups. The majority of television/VCR settings would fall under this category. Even in cases where the occupant lives alone, the lighting and furniture arrangements in these settings are typically geared towards small group gatherings. When only one person is present in aggregate or group oriented place, the setting maintains its functional or occupant orientation. This is possible because orientations are

determined according to collectively held images of places. Even though there is tremendous variability in theater and television/VCR settings, this research concentrates on the generally acknowledged commonalties attributed to these settings.

In addition to categorizing on the basis of functional orientation, a setting can also be distinguished by the exclusivity of the occupants:

Environments whose functions are performed by the same people on a regular basis we label same-occupant places; those whose functions are carried out by different people on a rotating basis we refer to as variable-occupant places. (Ibid., p.450)

In this study, movie theater settings are categorized as variable-occupant and television/VCR settings as same-occupant. The television/VCR setting may be occupied by different individuals for any given movie viewing event; nonetheless, it is assumed that the individuals involved will not change significantly from one occasion to the next.

Stokols and Shumaker make a further distinction between "single-function" and "multi-function" environments. In this research, television/VCR settings are considered multi-functional. While these spaces may be used primarily for viewing television and video products, they can also be used for a wide variety of activities, from simply visiting to doing crafts, homework, or domestic chores. Movie theaters, on the other hand, are considered single-function settings. While they may occasionally be used for purposes other than viewing motion pictures, such as live entertainment performances, alternative uses are rare and are not considered important to the perceived social field of these places.

Stokols and Shumaker also make a distinction between geographical and generic places; "the former refers to a particular geographical area whereas the latter refers to a category of places that are functionally similar" (Ibid., p.457).

Movie theaters are considered generic in that they all provide similar resources for

the singular purpose of exhibiting film. Television/VCR settings are considered geographical. While these settings may possess certain similarities (e.g. a television) they are private property and hold personal meanings for their occupants.

In summary, using Stokols and Shumaker's transactional taxonomy of settings, movie theaters have been categorized as patterned-activity, aggregate-oriented, variable occupant, single function, generic places. Television/VCR settings have been categorized as patterned-activity, group-oriented, same occupant, variable function, geographical places. Notice that the environments differ in all but the most general of the defining characteristics. Implications arising from these differences, in regards to motion picture viewing, will be discussed a little further on in the chapter. First, the settings will be analyzed in relation to the second major component of the transactional taxonomy - occupants.

Within any given setting occupants can act alone, as part of an aggregate, or as members of group. To clearly delineate between aggregates and groups, Stokols and Shumaker borrow Shaw's (1976) definition of a group:

Two or more persons who are interacting with one another in such a manner that each person influences and is influenced by each other person. (Shaw, 1976, p.11)

They make a further stipulation that members of a group must be cognizant of their mutual dependence with other members. This distinction is important in that the number of occupants in a place and their relationship to each other will have an impact on the type and nature of events that occur there. For instance, the quantity and quality of information available to an occupant is dependent on the presence or absence of others. Such information, in addition to idiosyncratic predispositions and social norms, will be used by occupants to interpret events and to guide their actions. Through observing the behavior of others and interacting with them (in groups and aggregates), and by recalling relevant past experiences, occupants

contrive individual "perceived place meanings" for any given environment (Stokols and Shumaker, 1976, p.454).

In the case of the motion picture viewing experience, the relation between people and places is somewhat complex. Whereas theater attendance usually occurs in groups of two, video viewing will often be done alone (Gunter and Levy, 1987). However, it is important to note that on those occasions when videos are viewed by groups the members are more likely to interact with each other than are the members of the small groups that compose the aggregate of the theater audience. Social etiquette dictates against talking aloud in theaters to the point that even quiet conversation is discouraged. Indeed, social mores associated with theater attendance are much more restrictive than those associated with in-home viewing. Aspects of theater movie-viewing controlled by persons other than the viewer include: the types of foods and beverages that can be consumed, appropriate forms of dress and posture, and suitable degrees of intimacy with one's companions.

The presence of others can affect people's reactions to the content of a movie. It is a common observation, for example, that laughter can be contagious. Potentially threatening situations can lose their fear-provoking qualities when encountered as part of a large group. *New York Times* film journalist, Vincent Canby explores the consequences of this effect in an article entitled "At Home The Story's Different":

A horror film, watched with a large audience in a theater, is a game. Watched when one is alone, in the kind of privacy in which one does a geography lesson (or shaves and showers), it assumes the importance of a disorienting day dream. (1988, p.H 29)

Empirical evidence confirming the idea that the company of others effects the movie viewing experience is provided by a study by D. Zillmann, J. Weaver, N. Mundorf, and C. Fust, which investigates the "effects of an opposite-gender companion's affect to horror" (1986). Male and female undergraduate students

were exposed to a horror movie in the company of an opposite-gender confederate. The confederate companions were of either "low or high initial appeal" and expressed either "mastery, affective indifference, or distress". The researchers found a number of interesting effects. Particularly interesting was the tendency for viewers to respond in sex-role stereotypes when the situation allowed for this type of behavior. When circumstances did not conform to traditional sex-role conventions, viewers tended to responded negatively to the viewing experience:

Men enjoyed the movie most in the company of a distressed woman and least in the company of a mastering woman. Women, in contrast, enjoyed the movie most in the company of a mastering man and least in the company of a distressed man. The intensity of distress in response to the movie followed the same pattern. (Zillmann et al., 1986, p.586)

In addition to the presence of companions, the familiarity of our surroundings can also affect our reactions to a motion picture.

People's relationships with places are dependent on certain properties of association (Stokols and Shumaker, 1976, p.455). The transactional perspective describes these properties as being either objective or subjective. Objective properties of association are discussed in terms of "place specificity". A person can be characterized as possessing high place specificity if they "perform particular activities in the same location or in categories of places, on a regular, predictable basis" (Ibid., p.455). Conversely, people who occupy a place on a random or sporadic basis are characterized as being place nonspecific for that particular location. For our purposes, persons who regularly attend movie theaters are classified as place specific; occasional movie-goers are place nonspecific. The same logic applies to video viewers, except that regular video viewers are classified further as geographically place specific owing to the fact that they usually view in the same environment. When the particular theater building is not a primary concern of regular theater-goers they are demonstrating generic place specificity.

Subjective properties of association are characterized by occupants' perception of the strength of their relationships with any given place:

When occupants perceive themselves as having a strong association with a place we describe them as place dependent. In contrast, when occupants observe a weak connection between themselves and a place, they are characterized as place independent. (Ibid., p.457)

With respect to theater versus in-home settings, it is intuitively appealing to categorize all regular video viewers as possessing higher place dependency than regular theater attendees. This categorization rests on the presumption that regardless of their preferred viewing environments, movie fans in general will possess a stronger attachment to their homes than to any theater. However, the process by which people are believed to assess their own place dependency gives reason to suspect that this intuitively based analysis may be too simplistic.

The transactional view postulates that, when brought to their attention, people will assess their place dependency on the basis of two factors: "(1) the quality of the current place; and (2) the relative quality of comparable places" (Ibid., p.458). The second factor is referred to as a person's "comparison level (CL)" and it is derived from past experiences. An occupant's level of satisfaction with a place is a function of "the extent to which an existing places' quality diverges from the occupants' CL for places" (Ibid., p.459). In other words, satisfaction is a function of how closely a place corresponds with an individual's idealized view of such places.

Whether a place is deemed satisfactory will, to a great extent, depend upon whether it provides the resources necessary for goal attainment. If the activity is motion picture viewing and the goal is psychological escape, then a theater may be more satisfactory than a television/VCR setting. This argument is based on the notion that the theater setting provides superior technical resources than in-home viewing environments and that these resources allow the viewer to become more absorbed in the movie viewing experience. However, if the goal of movie viewing is

to relax and be amused then a television/VCR setting may possess greater place quality than a theater. The assumption here is that the familiarity and convenience of home offers more opportunity for relaxation than theaters.

The examples given above are meant to illustrate the notion that television/VCR settings and theater settings are not always comparable. Although, from the outset they may appear as alternative environments their interchangeability depends on the expectations held by the viewer. In the end, place dependency must be considered in the context of the particular motivations of the occupant. However, when motion picture viewing goals are the same in both theater and video settings is it reasonable to infer that viewers who prefer the inhome environment possess higher place dependency:

Places that satisfy several needs (e.g. primary environments) probably lead to a type of place dependence that can be described as being more embedded, extensive, or deep-seated for the occupants than places in which possible activities (and, therefore, attainable goals) are narrowly defined. (Ibid., p.461)

Viewers who do not possess a high level of place dependency for their home environments may be more likely to choose a theater environment, particularly if their home environment falls below their comparison level.

In summary, motion picture viewers at home either act alone or as members of a group; theater patrons usually act as members of an aggregate. People who do not view movies, or view them only occasionally, do not occupy either viewing environment on a regular basis and are therefore classified as place nonspecific. Conversely, persons who regularly view movies in the same environment or class of environments are described as being place specific. The degree to which people perceive themselves as being associated with a place determines their place dependency. Movie viewers assess their place dependency in terms of the potential for goal fulfillment.

Motion Picture Theaters and Television/VCR Settings

The function of the motion picture theater is to exhibit movies. Its facilities are singularly designed to perform this function. For example, auditorium seats are arranged in a manner to give all patrons a clear view of the screen. The seats face directly forward on an incline to minimize any possible visual obstructions. The sound system, often arranged to completely surround the audiences' aural space, is sufficiently clear and loud to be easily heard by all. The lights are dimmed once the movie begins, making it difficult to see anything other than the screen which is large and very bright and commands the viewer's attention.

There is usually little decoration in today's theater auditoriums; an inoffensive and unmemorable design along the side walls and of course, the matching curtain which covers the screen when it is not in use. Lobby and concession areas may be a little more ornate but not substantially. Theaters for the most part (exceptions to the rule are discussed later), have adopted a functional approach in their interior design. The objective is to sell tickets and concession items as efficiently as possible, minimizing line-ups and while maximizing profits. Auditoriums must be filled, emptied, and cleaned quickly so that the next showing can precede on time. Loitering is discouraged because it makes it difficult for the theater staff to differentiate between those who should be leaving and those who have just arrived. Towards this end, theaters do not put forward a comfortable, lounge-about atmosphere. Unfortunately, in striving for efficiency some theaters end up treating their customers like cattle, ushering them through red velvet roped corrals.

When people go to the theater they know what to expect. There is basically only one thing that happens there. Once seated in the auditorium, audience members can be pretty much assured that there will be no disruptions in the

experience they are about to undergo. Most theater patrons are prepared to give their undivided attention to the action on the screen. Moreover, since they have invested a certain amount of time and money to attend, they tend to hold relatively high expectations.

Several aspects of the theater setting act to gently seduce the viewer into a passive state of receptiveness. First, the variable occupant orientation of theaters renders their patrons relatively anonymous. A certain sense of security can be assumed under these conditions. The darkness of the auditorium serves to enhance this emotional shelter. Not only are we unknown, we are unseen. This may provide for an enhanced sense of personal freedom. In addition, the "generic" quality of a theater, although impersonal, is free of reminders of personal duties and responsibilities. At home, even something as seemingly innocuous as a laundry basket can interfere with our enjoyment of a motion picture by reminding us that we have nothing to wear tomorrow. If a theater occupant is made to feel self-conscious it is usually in terms of identifying closely with one of the characters in the movie. The aggregate orientation of theater auditoriums is unique in that the space, while functionally designed for the housing of large numbers, is segregated into individual territories. The seats are arranged in a manner that discourages interaction between occupants and the darkness accentuates the solitariness of the viewing experience. Watching a movie in a theater is a shared experience, yet it happens to each viewer separately. Motion pictures, even those of the most banal variety, are a forum of social commentary; that is, they reflect the values and beliefs of our society. As such, viewing movies in the company of others, where the idea of the collective is salient, may contribute to our appreciation of the message. Moreover, within the shelter of the theater environment we can let our imagination have free rein and thereby make the viewing experience uniquely our own.

The television/VCR setting is, as discussed earlier, in many ways the antithesis of the theater setting. First, it is a same occupant, geographical place. Therefore, the occupants are usually intimately familiar with their surroundings. When there are two or more occupants, they are usually well acquainted with one another as well. Guests in such environments may feel either relaxed or ill-at-ease; but in either case they will likely be conscious of their role as guest and adhere to the basic rules of polite company.

There are several possible ramifications of familiarity in the motion picture viewing experience. Occupants may be too relaxed to properly attend to the motion picture, or they may be distracted by objects of personal significance. The environment may evoke emotional states that are incompatible with the content of the movie. Detailed knowledge of a setting and its contents may have the effect of neutralizing the affective qualities of the setting. In effect, television/VCR viewers may not derive sufficient inspiration from their environments to allow them to "psych" themselves up for (become psychologically prepared for) the movie viewing experience. If arousal levels are too low then the movie may not succeed in capturing the viewer's imagination, or even their interest. Guests in a television/VCR setting may find it difficult to concentrate on a movie when surrounded by the personal possessions of their hosts. They may find themselves more captivated by objects in the environment than the movie.

The probability of being distracted is greater in television/VCR settings than in theaters due to the fact that home settings are typically variable activity environments. The presence of opportunities to simultaneously engage in other activities while viewing a movie, can detract from the experience even when one chooses not to exercise their options. The mere availability of options is enough to divide the viewer's attention. Ignoring one's alternatives can be an effort in itself, and may give rise to feelings of guilt or anxiety, especially if the alternative is an

unpleasant but necessary chore such as vacuuming the carpet or cleaning the bird's cage. Amusing alternatives, like a game of billiards, can easily win our favor if the movie gets a bit slow. However, under different circumstances the same movie might be quite gripping.

Variable activity settings have a tendency to fragment our attentional resources, to borrow a term from cognitive psychology. Although we may allocate the majority of our processing capacity to the movie, we may also keep a certain amount on reserve for unpredictable events (e.g. the phone ringing). In some cases, objects in the television/VCR environment may actually compete with the movie for our attention, for example, the family dog wanting to go outside or the smell of fresh-baked brownies in the kitchen.

The group-orientation of in-home viewing environments only serves to exacerbate the problem of attentional interference. In the company of others, most of us feel socially obligated to engaged in at least occasional conversation. This is particularly difficult to avoid in the television/VCR setting where the furniture arrangements are usually composed to facilitate social interaction. While the pressure to be social may be lessened by turning off the lights, the temptation to comment aloud can be simply too irresistible, and then, of course, we must politely allow our companions their say as well. This problem can avoided by viewing alone, but then the shared experience effect is sacrificed. For some people, the act of viewing a movie by themselves may even give rise to feelings of loneliness and depression. This no doubt, would dampen the intended effect of a romantic comedy and probably many other movie genres as well. There is the possibility that in television/VCR settings the familiarity of viewers with each other and their environments encourages them to concentrate on the movie free of any pressure to socialize or engage in alternative activities. However, this may or may not occur,

whereas theater settings are intentionally designed to suppress this type of behavioral response.

In television/VCR environments the viewer plays a more active role than in theater environments. As mentioned earlier, videocassette technology offers the viewer unprecedented control over scheduling and programming. The wide range of titles available to video viewers, furthers their chances of finding a film they will enjoy. If they are mistaken in their choice it is no great loss since the cost of their investment is minimal compared to the price of theater admission. Moreover, they have the option of turning it off and watching or doing something else. In effect, viewing a video is less risky than going out to a theater. The drawback is that there is less reason to get excited about viewing a video, and this may translate into lower levels of viewer involvement.

Stokols and Shumaker claim that occupants utilize their past experiences in assessing the quality of a place. If they are right, then it would be reasonable to postulate that people may hold a less than favorable impression of television, particularly with regards to movie viewing. The rationale behind this idea is that by the time television stations acquire a movie, the hype and excitement that may have once surrounded it has faded. In addition, the second class status of made-for-TV movies, which are rarely of the same quality as major releases, may rub off on last year's box-office hit when it is viewed on a television screen. Also, regular programming on television, although very popular, is often criticized as being simple-minded, "opiate of the masses" entertainment. Movies, once they become television fare, may be subjected to the same types of criticism. If viewers' past experiences conform to the above impressions then they may evaluate movies watched in television/VCR settings more critically than movies watched in theaters.

Summary of Theoretical Perspectives

The theoretical constructs reviewed in this chapter have provided the basis for the hypotheses to be presented in the next section. While Stokols and Shumaker's transactional view is the primary framework employed to discuss the possible impact of setting on the motion picture viewing experience, contributions from several of the other theorists figure prominently in the rationale behind the expected results. For instance, McLuhan's views on media effects lends credibility to the notion that the unique settings associated with the different media will in fact effect the viewer's reception of the messages. The "Cinema Situation" as suggested by Mauerhofer also supports the notion that viewing environment influences the viewer's experience. His postulate that the theater environment, with its absence of visual and aural disturbances, propagates heightened interaction between the conscious and unconscious gives rise to expectations that the viewing environment will directly effect the viewer's appreciation and interpretation of a movie's content.

Mehrabian's proposed emotional dimension of arousal-nonarousal is expected to be especially useful in accounting for differences attributable to the theater environment. Likewise, the emotional dimension of pleasure-displeasure is expected to be helpful in accounting for differences attributable to television/VCR settings. The studies by Biggers et. al., employing Mehrabian's theoretical constructs, have provided some indication as to the direction of the relationship between the environment and the viewer's experience.

Each of the theories discussed in this chapter will be reassessed in the final chapter of this thesis. At that time, the ability of each theory to account for the results of the data collected will examined.

Setting and the motion picture viewing experience

The research undertaken in this thesis project is designed to evaluated the impact of setting on the motion picture viewing experience. To measure this, two

movies of similar genre are shown to viewers in either an in-home environment via videocassette player or in a motion picture theater. Each viewer experienced only one of the settings and one of the movies. After viewing the movie he or she was asked to evaluate the movie on three fundamental criteria: artistic merit, enjoyment and realism. Details concerning the research process, including the construction of the measurement instrument, will be provided in the following chapter.

It is anticipated that viewers in the theater conditions will rate the movies more positively with regard to artistic merit than viewers in the in-home setting. The basis for this projection stems from the belief that greater attention will be paid to the movie in the theater environment due to an absence of distractions. On the basis of Mauerhofer's analysis, it is also believed that the theater environment psychologically prepares the viewer for the optimal reception of the motion picture in ways the in-home environment can not. Moreover, in agreement with the arguments of Albert Mehrabian, it is anticipated that theater settings will instill higher arousal levels in their occupants than television/VCR settings which, in turn, should give rise to more positive ratings of artistic merit than those found in television/VCR settings.

No difference is anticipated between environments in respect to viewers' ratings of the movies in terms of enjoyment. Although, the in-home setting has been described as superior with regard to pleasantness (which is thought to influence occupants' capacity for enjoyment in a given place), viewers' evaluations of the movie content are not expected to reflect this inequality. The rationale for this prediction is that, while in-home settings may be seen as pleasant, theaters are not normally seen as unpleasant; Also, the pleasantness of home is not missed when one is deeply engrossed in a motion picture. The same reasoning does not apply to arousal levels. In-home viewing environments can be actually non-arousing or even

sedentary. Lack of arousal, unlike lack of pleasantness, can greatly detract from the experience of viewing motion pictures.

Movies viewed in the theater are expected to be rated as having greater realism than movies viewed at home. The heightened arousal and involvement levels presumed to be associated with theater environments are expected to manifest themselves in such a manner as to cause viewers to feel that the events occurring on the screen are more plausible than they would appear on television. Also, past experience with television programming as a less realistic medium compared to major motion pictures is expected to result in viewers attributing the same or similar evaluations to movies seen on television screens.

Participants in the theater conditions of this experiment are expected to give their viewing environment superior ratings in regard to the material resources of the setting. According to Stokols and Shumaker, people will compare their present environment with suitable alternative environments when asked to evaluate their level of satisfaction with a particular place. If participants are making this comparison, it seems reasonable to assume participants in the video condition will express less satisfaction with the material resources of their environments than will participants in the theater conditions.

Participant ratings of subjective qualities of their environments, such as comfort, are expected to be more positive in video conditions than in theater conditions. Home environments are typically customized to meet a variety of occupant needs and desires, and therefore are usually seen as more gratifying than public environments, such as theaters. An inverse relationship is expected between participants' subjective ratings of their viewing environments and their ratings of the artistic merit and realism of the movies. Conversely, a positive correlation is expected between participants' ratings of the material resources of the viewing environment and their ratings of the movie.

It is hoped that through testing these hypotheses some light will be shed on the possible effects of setting on the motion picture viewing experience. It is further hoped that insight will be gained into the specific implications for motion picture exhibition and production in the age of the videocassette player and pay-TV. In the next chapter the methods employed to carry out this research are outlined.

Chapter 4

Methodology

The study undertaken for this thesis project is best described as field research. Characteristic of this type of research are natural, as opposed to laboratory, settings. Field research is the usual approach taken for studies in environmental psychology. If the research objective is to measure the effects of environmental variables on specific aspects of the movie viewing experience, it is essential that the environment resembles natural settings as closely as circumstances will permit.

Data collection techniques in field research can be purely observational or involve the use of measurement instruments such as questionnaires. The present research is of the latter variety. Field research is considered to be experimental when certain variables are controlled or manipulated in an effort to assess their impact on subjects' behavior. The research presented below investigates the impact of the motion picture viewing environment on audiences' viewing experiences. To accomplish this, the viewing environment and the movie viewed are manipulated by the experimenter; hence this project can be classified as a field experiment.

Research Design

This research project assumes a two by two, between groups experimental design. The two independent, or manipulated, variables are the viewing environment and the movie viewed. The dependent measure is the audiences' reactions to the movies as measured by 33 bi-polar adjective scales. In addition, measures of the audiences' reactions to their viewing environment, their behaviors while viewing, and their regular motion picture viewing habits and preferences are taken. The development of the testing instrument will be described in detail later on.

Each individual participates in one experimental condition. In other words, participants view only one of movies, in only one of the environments. Participants' age, gender, and place of residence are balanced across conditions.

Half of the data collection takes place in television/VCR settings in the participants' personal residences. The other half takes place in a public motion picture theater. There is undoubtedly great variability within the television/VCR conditions; people's homes are personalized to suit their lifestyles and tastes. However, the effects of such diversity are, in part, what this experiment aims to measure. The theater setting, on the other hand, is the same throughout the study. This is not considered problematic for there is generally not much diversity amongst theater environments. The naturalistic settings used in this experiment are assumed to lend external validity to the results.

Participants viewed either *The Name of the Rose* (1986) or *Blade Runner* (1982); both movies are feature length American productions with at least one well known major actor. A more detailed description of the movies is provided later on. Each of the two movies were viewed by roughly equivalent numbers of participants in each of the two settings. The purpose of using two movies is to control for the possibility that the results could be due to the particular movie viewed rather than to the viewing environment. If audience reactions differ more between settings than between movies than it can be postulated with some assurance that the effect is attributable to the viewing environment.

Participants

The sample was composed of 132 undergraduate students recruited from introductory psychology classes at the University of Alberta. Students who had not fulfilled a research participation requirement of their studies (approximately one quarter of participants) received credit for their participation in this experiment. The remaining participants acted purely on a voluntary basis. Usable data was

collected from 100 participants, 52 of whom were female, 48 were male. All participants were between the ages of 18 and 33 years; the average age was 20 years. 80 percent of participants were under 22 years of age. Ninety-three percent of participants were single, 4 percent were widowed or divorced, and 3 percent were married.

The above demographics reflect a sample that is representative of the most frequent theater-going population in our society (Statistics Canada, 1985-86). While the homogeneity of the sample may limit the generalizability of the results, the exploratory nature of this research called for the participation of persons who were most likely to be sensitive to changes in the movie viewing experience.

Sub-groups

Within the sample population used for this study several sub-groups can be differentiated. Sub-groups refer to two or more participants who possess some shared characteristic that may give rise to distinct response patterns (e.g. age, gender, prior viewing, etc.). It is important to determine whether such response patterns exist in the data so that incorrect generalizations of the results can be avoided. For instance, an effect that appears to apply to the entire sample may only apply to small but relatively extreme sub-group. It was felt that participants who shared one of the following characteristics might constitute distinct sub-groups: gender, frequency of theater attendance, frequency of video viewing, preference for viewing environment, place of residence, and prior viewings of the movie.

Gender differences were tested for as a matter of standard practice; no specific relationship between gender and responses was anticipated.

Participants who frequently view videos or attend theaters may have different expectations of the viewing experience than participants who rarely or occasionally view videos or attend theaters and therefore produce distinct response patterns. As expected, most of the participants in this study attend motion picture theaters on

regular basis. Only 9 percent reported not having attended a single movie in the two months prior to participating: 51 percent of participants reported having gone to a theater at least once in the past two months; 31 percent had attended at least 4 times; and 8 percent had attended 7 or more times. For the purpose of comparison, participants have been categorized as either frequent movie-goers, those having attended a theater 4 or more times over a 2 month period, or occasional movie-goers, those having attended a theater 3 or less times over the same period. Frequent movie-goers make up 40 percent of the population, occasional movie-goers made up the remaining 60 percent. Frequent and occasional movie-goers are represented equally across conditions.

Participants also viewed movies on video fairly often. Only 14 percent reported that they had not viewed a single prerecorded movie on video in the 2 months prior to the experiment: 29 percent reported at least one viewing, 23 percent reported at least 4 viewings, and 34 percent reported viewing 7 or more movies on video over the same period. Frequent video viewers make up 57 percent of the sample population, occasional video viewers 43 percent, using the same criteria for classification as for theater attendance groups. Frequent and occasional video viewers are represented equally across conditions.

Participants' preferences for viewing environments may reflect certain expectations of the experience. For instance, people who prefer to view movies in the home may think of movie viewing as a opportunity to relax, whereas people who prefer theater environments may think of movie viewing as an opportunity to become excited. Differences in expectations about the viewing experience may give rise to differences in reactions to the movies. Most participants in this study indicated a preference for theater over in-home viewing, 74 versus 26 percent.

It was felt that participants who live in their parents' home may hold a bias in favor of theater viewing because it provides an opportunity to get out of the house.

Participants who rent shared accommodation may also feel that theater attendance is an opportunity to spend some time outside of their residence. On the other hand, participants who rent accommodation, particularly those who rent alone, may prefer in-home movie viewing for financial reasons. In any case, if place of residence is somehow involved in preferences for viewing environment, the influence may extend into viewers' evaluations of movie content. In dividing the sample by their place of residence three groups were formed: resides in parents' home (47 percent), rents shared accommodation (35 percent), and rents alone (16 percent).

In addition, it was felt that participants who had already viewed the movie prior to the experiment might be influenced by their earlier reactions to the movie. Moreover, the environment in which they first viewed the movie might contribute to their impressions. Three sub-groups were formed on the basis of prior viewing. The first group had not viewed the movie before participating, the second group had seen the movie on video, and the third group had seen the movie in a theater. Only 32 of the participants in this study had previously viewed the movie they were assigned. Of these, only 16 percent had viewed the movie within the last six months; 67 percent or previous viewers first saw the movie via a videocassette player. Participants who had previously viewed the movie were equally distributed across conditions.

The Movies

The Name of the Rose, a Jean-Jacques Annaud film, is a screen adaptation of Umberto Eco's novel of the same name. The movie stars Sean Connery as William of Baskerville, a Franciscan monk, and F. Murray Abraham as Bernardo Gui, an officer of the Holy Inquisition. The action is set in the 14th century in an isolated monastery high in the mountains. A series of mysterious deaths alarms the religious community causing many to believe the monastery has been possessed by the devil. William and his novice, visitors at the abbey for the purpose of a formal religious

debate, uncover the real cause of the deaths and the motivation of the murderer. The movie is 126 minutes in length.

Blade Runner is a film by Ridley Scott, starring Harrison Ford, Rutger Hauer, Daryl Hannah, and James Edward Elmos. The story is set in Los Angeles, California in the year 2019. Replicant rebels, genetically engineered robots with human traits and appearances, return to earth on a mission to convince their maker, by reason or force, to reprogram their preset termination dates. The authorities coerce an ex-force member, Deckard, played by Ford, to assume the role of a Blade Runner. A Blade Runner is a special agent who has been trained to hunt down and "retire" rebellious replicants. Ford is ordered to destroy the rebels before they cause any harm. By the end of the movie it becomes very difficult to distinguish the good guys from the bad guys. The movie is 115 minutes in length.

Although *The Name of the Rose* is set in the 14th century while *Blade Runner* is set in the 21st century, the two movies are similar in a number of respects. First, they are both serious dramas; there is very little comic relief in either picture. Both movies involve a number of violent deaths and the protagonist, a mature male in both cases, is persecuted by persons in authority. Both movies can be described as suspense thrillers. In addition, they both challenge certain doctrines of organized religion, although *Blade Runner* is more symbolic in its attack. There is an minor element of sexuality and just a hint of romance in both the movies. Both movies end with the senseless destruction of something inherently valuable.

While the movies are set in radically different places, an isolated monastery and a major U.S. city, they share a certain atmospheric quality. Both locations are cold, dark, barren, impersonal, and hard. Stylistically the cinematography is very similar between the pictures. Much of the action occurs in dark corners, and when there is light it seems painfully bright and unnatural. The greatest difference

between the films is in the pace of action, *Blade Runner* being considerably faster than *The Name of the Rose*.

These particular movies were chosen largely for reasons of practicality. First, it was deemed desirable to have two movies that were relatively similar, at least in respect to genre. The reason for this is, once again, the exploratory stage of this type of research. Different genres of movies may be more suitable for viewing in different types of settings. For example, it may be that romantic comedies elicit much the same response from audiences whether they are viewed in the home or in a theater. This type of film tends to follow the same basic format as a lot of television programming. On the other hand, "epic" movies that involve numerous long-panning shots and scenes with large casts, may not produce the same effect on television as they would in a large-screen theater. Differences in audience reactions due to settings may be masked if the movies used for comparison are too dissimilar. For this reason, it was deemed appropriate to use movies which were neither typical of television fare nor dependent on large-screen presentation. In addition, to make fair comparisons across conditions, the chosen pictures had to be fairly equivalent in terms of their entertainment value: the quality of acting, special effects, cinematography.

The movies chosen for this project had to be available on videocassette. This meant that the pictures would have to have been released in theaters at least four months prior to the data collection period. In this case, if the movies were very popular many of the participants would have recently seen them. If the movies were unpopular, many of the participants would have chosen not to see them and would likely hold a negative opinion of them prior to participating in the experiment. In any event, very few movies are still playing at theaters by the time they are released on video, and the expense of renting a theater and copies of two recent films for private viewings were beyond the budget of this research project. Moreover, even if

it were financially viable to hold private screenings the situation would lack realism and the value of participants' responses would be limited. What was required were two movies that were a few years old, that had either escaped the attention of today's movie-goers or were before their time.

The movies also had to be playing at a convenient time at a second-run or repertory theater. Very fortunately, *The Name of the Rose* and *Blade Runner* were playing on consecutive evenings at the Princess Theatre, Edmonton.

The Princess Theatre

The Princess Theatre is an independently owned and operated repertory theater located on the southside of Edmonton in an area known as Old Strathcona. Originally built in 1915, the building was declared a historic site in 1976. The theatre has undergone extensive renovations including the installation of a Dolby Sound stereo system. The decor of the theatre had been restored as much as possible to its original splendor:

The red plush seating was matched with such decorative elements as plaster friezes painted with gold leaf, and elaborate bracket lamps. Above the stage was a magnificent tableau painted in oils depicting a mythological scene of nymphs in a seascape. (Morrow, 1989)

Today, of course, the gold leaf has been replaced by gold-colored paint, and the bracket lamps by affordable modern day equivalents.

The theatre publishes its film programmes in its own local film periodical, aptly called the "Princess Magazine". The programmes are typically made-up of several foreign language films, a number of British and American classics, premieres, film series (featuring actors, genres, or film makers), family matinees and occasionally, second- or third-runs of popular, relatively mainstream, American movies, like the two used in the present research. The magazine also features a number of articles reporting on a variety of aspects of the film industry.

Obviously, the Princess Theatre is unlike conventional theaters in both its programming and decor. Many would classify the Princess Theatre as an art theater. Unfortunately, this reputation is less than ideal for the present field experiment in that, the unique setting may give rise to a viewing experience not typical of conventional theaters. This, however, was unavoidable for reasons stated in the preceding section. On the positive side, the Princess Theatre is exactly like other theaters with respect to its functional orientation. This theater, like all conventional movie theaters, is a patterned-activity, aggregate-oriented, single function place (Stokols and Shumaker, 1984). While there is the possibility that the perceived social field of the Princess Theatre may be different from conventional first-run theaters, it is assumed that there is sufficient similarity to allow for cautious generalization of the results.

The Instrument

The questionnaires designed to collect data regarding participants' present and past motion picture viewing experiences are composed of five sections (copies of the two versions of the questionnaire can be found in the appendix). The first part requests basic demographic information. In addition, information regarding previous viewing(s) of the movie viewed for the experiment is collected to account for the possibility that participants who had viewed the movie prior to the experiment might respond differently than participants who had not. This section also includes three short answer questions contrived as safeguards to ensure that participants had actually viewed the movies. The answers to these questions required a general knowledge of the movie's characters, settings, and plot.

The second section of the questionnaire constitutes the dependent measure, namely, audiences' reactions to the motion pictures. It is composed of 33 bi-polar adjective scales compiled by Richard Caplan (1975) as an instrument for measuring audience reaction to motion pictures. Caplan defines audience reaction as "the

feeling state reported by audience members following the viewing of a film" (Ibid., p.6). The scales used in this study were originally part of a pool of 96 bi-polar adjective pairs. Caplan tested all of the scales for their effectiveness in measuring viewers' reactions. Data collected from 292 undergraduate students who had each just viewed one of 50 first-run movies of their choice were subjected to a principle axis factor analysis. The 33 scales mentioned above, formed three factors which accounted for 74.9 percent of the variance. Only scales with a loading of at least .60 for one factor and not over .40 on any other factor were included in the factors.

The first factor accounted for 45.2 percent of the variance and was labelled "Artistic Merit": "It appeared to be a global measurement of audience judgment of the aesthetic quality of a film" (Ibid., p.77). Nineteen scales contribute to this factor, including such items as: entertaining-boring, meaningful-meaningless, and superiorinferior. The second factor accounted for 19.6 percent of the variance. This factor was labelled "Enjoyment"; "These items measure whether the film produced a pleasurable impression in audience members" (Ibid., p.77). Ten items make-up this factor, including: uncomfortable-comfortable, dreary-cheerful, and delightfulpainful. Implicit in the adjective pairs used in this factor is the assumption that light-hearted, comic films are more enjoyable than heavy-hearted, tragic films. This assumption is cause for concern because serious dramas are most likely enjoyed in a different sense than comedies. When the instrument was tested for construct validity, this factor performed poorly, meaning that as a measure of enjoyment it may be limited to a specific type of pleasure. More will be said about this further on. The final factor, Realism, accounted for 10.1 percent of the variance: "This factor measured audience perception of the believability of a film" (Ibid., p.77). Four items such as, impossible -possible are included in this factor. Caplan found two other factors, as well, Activity and Purity, accounting for an additional 4.3

percent and 3.3 percent of the variance respectively. Due to their limited power, these factors were not used in the research project undertaken for this thesis.

Caplan performed a test of construct validity by randomly assigning 40 students to view either an aesthetically good or bad student film. The films were initially judged on aesthetic quality by an independent panel. If his instrument was valid, the students' responses should differentiate a good from a bad film. Both Artistic Merit and Realism factors were found to be valid measures of their respective areas. No difference between groups were found on the factor of enjoyment. Caplan suggests two possible explanations for this finding:

The fact that both films were student productions may explain the audiences' perception of neither film as being significantly different on the dimension of enjoyment. In addition, the controls of a laboratory situation may have limited the enjoyment of viewing a film (Ibid., p.87)

It might also be that enjoyment is more complex than the adjective pairs indicate. For instance, viewers may believe that an impressive film is more enjoyable than an unimpressive one. However, this scale falls under the factor of Artistic Merit. Caplan's enjoyment factor might actually be measuring something akin to amusement. This limitation, while worthy of attention, was not considered a major problem for the present study. If the movies were from different genres, for instance a romantic comedy and a murder mystery, the measure of enjoyment may be relatively meaningless. However, as mention earlier, the movies chosen for this research are quite similar in style and substance.

Caplan also use Hoyt's procedure for estimating reliability by analysis of variance on the three factors. His results suggested that reliability of the Artistic Merit factor was "extremely high" and reliability for Enjoyment and Realism were "very high" (Ibid., p.84).

In addition to the 33 scales offered by Caplan, an extra scale was included in this section of the questionnaire. This scale was constructed to measure viewers' perceptions of their own emotional involvement in the movie. The inclusion of this item in the present study was to test for the possibility that the theater viewing environment is more conducive to high levels of emotional involvement. When Caplan developed his instrument, in-home viewing alternatives had just been introduced, so the need for this type of measure may not have been apparent.

The third section of the questionnaire is designed to record participants' impressions of their viewing environment. There are two parts in this section; the first attempts to measure the audience's subjective reactions to their environment; the second part assesses their level of satisfaction with a variety of material properties in their environment. The same bi-polar adjective scale format is employed in the first part of this section as was employed in the previous section. These adjective scales are not part of a tested instrument; rather they were chosen as general descriptions that could apply to any environment. The decision to adopted the same format as the previous section was made on the grounds that participants would already be familiar with the response procedure. The second part of this section employs Likert rating scales to measure audiences' evaluations of material resources in the viewing environments. Participants were requested to rate various aspects of the environment on a scale from one to five; one indicating "not at all satisfactory" and five indicating "completely satisfactory". Items rated include: sound quality, picture quality, viewing distance from screen, and others (see appendix for complete list of items).

Section four of the questionnaire addresses participants' experiences while viewing the movie. The objective of this section, and the previous one, is to gather information that will be useful in interpreting differences in audience reactions to the movies. It is important to know how the circumstances surrounding the movie

viewing experience differ from one environment to the next. Obviously, there are certain types of activities that are limited to the in-home viewing environment, such as fast-forwarding; therefore two separate versions of this section were constructed, one for each viewing environment. Inquiries were made about participants' viewing companions, snack foods, alcohol consumption, and other aspects of the experience. The two versions of the questionnaire were made as parallel as possible for the purpose of comparison.

The fifth section of the questionnaire addresses participants' motion picture viewing preferences and habits. It consists of two parts. The first part requires participants to indicate their level of liking for seven basic movie genres on a scale from one to five, one being "like" and five being "dislike". The second part of this section requests information regarding regular theater attendance and video viewing habits. Participants are also asked which viewing environment they prefer: theaters or television/VCR settings.

The final section of the questionnaire is designed to measure participants' opinions on the importance of various aspects of the motion picture viewing experience. It is composed of rating scales ranging from one to five, one being "very important" and five being "not at all important". Items to be rated include: expense, variety of titles, screen size, and others. Participants were instructed to consider both viewing environments in making their ratings.

The questionnaire was revised on two occasions. A first set of revisions was made after consultation with two research professionals, an expert in survey design, and a data analyst. A second set of revisions were made after the instrument had been pilot tested by a dozen individuals, of approximately the same age and social status as the sample population. Half the participants in the pilot test were invited to attend a theater to view the movie of their choice; the other half were invited to view the video of their choice. Each completed the appropriate version of the

questionnaire and recorded their comments and suggestions regarding the clarity and comprehensibility of the questions. Any events occurring during the viewing experience that the instrument neglected to touch upon, were recorded by the pilot test participants. A number of changes were made to the questionnaire on the basis of this feedback.

Administration and Procedure

Participants were recruited from introductory psychology lectures. The experimenter addressed classes explaining that she was conducting an experiment investigating how people form opinions about motion pictures. The students were told that participation in the experiment would involve viewing a motion picture and then filling in a questionnaire. The movie titles were not given, but the students were assured that the movies to be viewed were main stream American featurelength dramas. They were also assured that their participation and any data collected would be kept strictly confidential. Half of the classes were told that participants must have access to a videocassette player, that prerecorded videocassettes would be supplied to them, and that arrangements could be made for them to view the movie at their convenience. The other half of the classes were told that the movies were playing at the Princess Theatre, on May 13, 1989 at 9:00pm and May 14, at 9:15pm, that they would be supplied with an admission pass for one of those evenings, and that they would have to return completed questionnaires to the experimenter within a few days of viewing the movies. Willing students were asked to leave their names and phone numbers on a sign-up sheet after the class and were told that the experimenter would be in touch with them in the next couple of days.

Participants in the theater conditions met in small groups with the experimenter at least a week prior to the date the first movie was shown. At this time, each participant received an admission pass to one of the movies. Participants

who had previously viewed one of the films were given a pass to the other movie. Likewise, if a participant could not attend on one of the nights, they were given a ticket to the alternative night. Participants without previous engagements who had not viewed either of the movies, or had previously viewed both of the movies, were randomly assigned to a movie. All participants were given a questionnaire in a sealed envelope. They were reminded once again that the purpose of the study was to assess how people form opinions about motion pictures. They were assured that the questionnaire would not request any information about specific details in the movie - that it was not a memory task. They were told that they were welcome to take friends along with them, at their own expense, and that they should treat the outing like any other night at the theater. It was requested that they not read the questionnaire prior to viewing the movie since the objective was to record their honest opinion and the wording of the questions might influence the way they view the movie. The experimenter's office number and hours were listed on the outside of the envelope. Participants were asked to return their completed questionnaires to the office at their earliest opportunity.

When participants in the video cassette conditions were contacted by phone, arrangements were made for a convenient day for them to pick up a movie, take it home, view it, and return it to the experimenter's office the next day. When they arrived at the office to pick-up the video, the same instructions were given to them as were given to the theater condition participants. They were reminded about the purpose of the study, given a sealed questionnaire, told that it was not a memory task, instructed not to read the questionnaire prior to viewing and to treat the occasion as they would any other video viewing. If participants had previously seen one of the movies they were given the other one. Participants who had previously seen both of the movies, or had never seen either of them, were randomly assigned a

movie. Completed questionnaires were to be returned with the video cassette the following day.

When participants returned their questionnaires they were debriefed as to the main hypothesis of the study. It was explained that another group of participants viewed the movies in the alternative environment and that their group's reactions would be compared to the other group's. Prior to being told the hypothesis, participants were asked if they had formulated any ideas about the purpose of the study. Only one participant correctly surmised the purpose of the research; his responses were excluded from the data analysis. Each participant was once again assured of his or her confidentiality and given a copy of a brief description of the theoretical framework and experimental design used in the study. Participants were requested not to discuss the study with anyone until after the data collection was completed.

Questionnaires given out to participants in the theater condition were assigned a code number that corresponded with the number on the participant's admission pass. All passes were collected by theater staff at the box office. This made it possible to verify participants' attendance at the theater. Only those questionnaires whose code number matched one of the admission passes collected at the door were included in the data analysis. Of the 80 passes distributed, only 51 were collected. Two of the participants who attended the movie were outside of the age restrictions imposed on the sample for this study. Their data was not included in the analysis. In the end, a total of 48 questionnaires from the theater conditions were usable.

Many of the participants for whom no matching admission pass was collected still returned completed questionnaires to the experimenter's office as requested. This was seen as very peculiar because most of these students had nothing to gain by making the return trip to the office. One of the participants, upon hearing the

primary hypothesis of the study, admitted having viewed the movie on video. She explained that viewing on video was simply more convenient and that she had not realized that the viewing environment was essential to the experiment. It seems likely that other participants also viewed the movie on video, but did not own up to it in an attempt to save face. Participants were not told that admission passes had been collected, and consequently were unaware that their attendance could be verified. While it is unfortunate that their data could not be used, it is interesting that they may have chosen to assume the cost of viewing a video at home, rather than attending a theater for free.

Participants for the video conditions were recruited after participants for the theater conditions. This was done because each movie only played for one night at the theater, and therefore, there would have been no other opportunity to run this condition. When only 48 of the 80 theater admission passes produced usable data, it was decided that only an equivalent number of students would be asked to participate in the video conditions. Accordingly, 52 students were recruited for these conditions; all of these participants produced usable data.

Completed questionnaires were coded, proofed, entered into a computer file, and then proofed again.

Chapter 5

Results

The results of this study lend evidence to the notion that receivers' appreciation and understanding of a media message can be significantly altered by the environment which surrounds its delivery. In particular, audiences viewing a motion picture in a theater will evaluate the movie more positively than audiences viewing the same movie on video. However, this effect only appears to occur for evaluations closely related the arousal state of the viewer.

The results also suggest that audience members are not particularly discriminating with respect to the viewing environment. Moreover, they do not appear to be aware of influence exerted by environmental variables. In judging their level of satisfaction with a viewing environment, they do not seem to draw comparisons with alternative viewing environments.

Reliability Test of Dependent Measure

A principle components analysis, as executed by the Statistical Package for the Social Sciences (SPSS-x), was run on Caplan's 33 bi-polar adjective scales for measuring audience reaction to motion pictures, using the data collected in the present study. The factor matrix that was produced was rotated using the conventional Varimax Rotation. This process follows essentially the same analysis conducted by Caplan on the original data. The purpose of the present analysis was to test the instrument's reliability.

The results of this analysis were in general agreement with Caplan's, at least with respect to the artistic merit and realism factors. The enjoyment factor did not maintain its original composition; rather, enjoyment items clustered into several smaller factors. These factors are treated as sub-factors of enjoyment. A summary of the principle components analysis is listed in table one.

Insert Table 1 about here

Six factors were found. All items were listed under the factor for which they held the highest loading. A seventh factor was discounted because all of the items were more highly loaded on at least one of the other six factors.

The first factor matches Caplan's "Artistic Merit" factor almost perfectly. Only the absence of the item condemnable-admirable separates the original factor from the one found using the present data. This factor also has the additional item emotionally involving-uninvolving, which was added to the instrument for the purpose of this experiment. Table 2 lists the items for factor one and their respective loadings.

Insert Table 2 about here

These results would indicate that the "Artistic Merit" factor is reasonably reliable, and that a person's perceived emotional involvement with a motion picture is highly correlated with their perception of the movie's artistic merit.

The second factor matches Caplan's "Realism" factor item for item. This result attests to the reliability of this measure. The items that make up this factor and their respective loadings are listed in Table 3.

Insert Table 3 about here

Factors three, four, five, and six can be described as fragments, or sub-factors, of Caplan's "Enjoyment" factor. A summary of item loadings for these sub-factors is presented in Table 4.

Insert Table 1 about here

Sub-factor 3 contains 2 items which appear to address the physical presence of the movie, namely, painful-delightful, and uncomfortable-comfortable. This sub-factor also includes the item extracted from the original artistic merit factor, condemnable-admirable. This item's contribution to sub-factor 3 is relatively minor with a loading of only 0.48, and a next highest loading of 0.40 under the artistic merit factor. The items contributing to sub-factor 4 all appear to address the amiability of the movies. Two of the items under this factor, dreary-cheerful and tragic-comic have relatively low loadings. Sub-factor 5 contains the items which at face value assess the comicvalue the movies, serious-funny and humorous-serious. Sub-factor 6 contains only one item, stiff-relaxed, which appears to measure the rigidity of movies.

The apparent unreliability of Caplan's "Enjoyment" factor can be explained in part, by the limited number of movies and subjects used in this experiment. The original data used for this analysis included responses from over 290 participants on 50 different movies. Moreover, as mentioned in the previous chapter, Caplan's internal validity tests did not produce favorable results for this factor. It may be that the specific movies used in this experiment, namely suspense thrillers, do not elicit the same type of enjoyment as Caplan's factor proposes to measure.

In discussing the results of this experiment, factors 3,4,5, and 6 are treated as sub-factors of the larger factor of enjoyment. Individually, these factors are not very informative regarding the nature of the viewing experience; taken together they can at least be used to compare responses between the viewing environments.

Factor Analysis: Subjective Properties of Viewing Environment

The scales measuring audiences' reactions to the subjective properties of their viewing environments were subjected to a principle components analysis to determine the number of factors being measured. The results were rotated using a Varimax Rotation program. A summary of this analysis is listed in Table 5.

Insert Table 5 about here

Four factors accounting for 65.3 percent of the variance were found. These factors are thought to represent the following dimensions: pleasantness, affluence, aesthetics, and restfulness. Item loadings for each of the factors are listed in Table 6.

Insert Table 6 about here

The first factor accounts for 37 percent of the variance. An appropriate heading for this factor was deemed to be "pleasantness". It included the following 7 items: inconvenient-convenient, comfortable-uncomfortable, soft-hard, personal-impersonal, warm-cold, dreary-cheerful, and difficult-easy. The second factor accounts for 15.1 percent of the variance. This factor appears to measure the "affluence" of environments. The 4 items contributing to this factor include: plain-elaborate, pompous-humble, unique-common, and rich-poor. The third and fourth factors account for 6.9 and 6.3 percent of the variance, respectively. Factor 3 is labelled "aesthetics", for lack of a better label, and factor 4 is labelled "restfulness". The scales, clean-dirty, cramp-spacious, and beautiful-ugly make-up factor 3; and loud-quiet, vulgar-elegant, and artificial-natural make-up factor 4. The beautiful-ugly and vulgar-elegant scales load nearly as high for each other's factor as they do for their own, suggesting some overlap in the factors.

Participants

Data from 100 undergraduate psychology students was collected. Female students comprised 52 percent of the sample, male students comprised the remaining 48 percent. All participants were between the ages of 18 and 33 years of age; 80 percent of participants were under 22 years of age. The vast majority of participants were single, 93 percent, 4 percent were widowed or divorced, and 3 percent were married.

The Viewing Environment and Audience Reaction to the Motion Pictures

The viewing environment was found to have a significant impact on audience's reaction to the movies with respect to artistic merit. However, no impact attributable to environmental variables was found with respect to audience's reaction to the movies' enjoyment and realism values.

Artistic Merit

The impact of setting on the motion picture viewing experience was found to produce a strong main effect with respect to audiences' evaluations of the movies' artistic merit. An analysis of variance of the combined score for artistic merit items showed a significant difference between theater viewers and video viewers. There were no differences between movies and no interaction effects. A summary of this analysis is listed in Table 7.

Insert Table 7 about here

Ten of the twenty artistic merit items yielded significant results as a function of viewing environment. Several of the items are significant for both the viewing environment and the movie viewed. In these cases, however, the strength of the relationship between the setting and the item is usually greater than between the

movie and the item. Table 8 presents a summary of the means and standard deviation scores for each of the artistic merit items.

Insert Table 8 about here

Theater audiences rated the movies more positively than video audiences on the following scales: entertaining-boring (P=.05), dynamic-static (P=.006), special-ordinary (P=.003), exciting-dull (P=.002), valuable-worthless (P=.01), unimpressive-impressive (P=.003), and emotionally involving-uninvolving (P=.003). Both the viewing environment and the movie viewed effected ratings on the following scales (probability score refers to difference between settings, difference between movies is reviewed later): meaningful-meaningless (P=.001), weak-strong (P=.043), and effective-ineffective (P=.001). No differences were found in participants' ratings, either between settings or movies, on the following scales: condemnable-admirable, smart-stupid, great-obscure, good-bad, superior-inferior, imperfect-perfect, and unskillful-skillful.

Enjoyment

The viewing environment does not appear to have any impact on audiences' enjoyment ratings. An analysis of variance of the combined score for enjoyment items did not indicate any significant results in audiences' ratings. Table 9 presents a summary of the analysis of variance for this factor.

Insert Table 9 about here

Individually, two separate but related enjoyment scales showed significant results as a function of viewing environment. Participants in the theater conditions rated the movies as less serious than participants on both the humorous-serious

(P=.046), and the serious-funny scales (P=.026). A summary of the mean scores for each of the enjoyment items by movie is presented in Table 10.

Insert Table 10 about here

Scores for enjoyment items across all conditions were low. For example, the highest mean score for all enjoyment items combined was recorded by participants in the theater/Blade Runner condition at 3.2 out of a possible 7 points.

Realism

An analysis of variance of the combined realism items showed no difference in responses between viewing environments. Likewise, the mean scores given by each experimental group for individual realism items, show no evidence of setting having a significant impact on participants' reactions. Tables 11 and 12, respectively, present a summary of the analysis of variance for the realism factor and mean and standard deviation scores for each of the realism items.

Insert Tables 11 and 12 about here

Interaction Effects

No interaction effects were found between the viewing environment and the movie viewed in terms of audiences' reaction to the motion pictures.

Audiences' Reaction to the Motion Picture Viewed

As to be expected, the two movies, *Blade Runner* and *The Name of the Rose*, gave rise to different evaluations by their respective audiences on a number of different items (see Tables 8,10,and 12). Artistic merit items revealing differences in audience reaction are: disappointing-fulfilling (P=.049), meaningful-meaningless (P=.037), full-empty (P=.03), tasteful-tasteless (P=.012), weak-strong (P=.001),

and ineffective-effective (P=.027). Only one enjoyment item showed a difference as a function of movie viewed, stiff-relaxed (P=.045). All of the realism items produced differences based on the movie viewed (P=.001 for all items).

These differences are not of any real consequence to the objective of the present study, with the possible exception of the realism items. In this case, the differences between the movies was so great that environmental effects may have been masked. Overall, both movies were well received by participants, although *The Name of the Rose* was given more positive ratings on a few items.

Audiences' Ratings of the Viewing Environments

Subjective Properties Ratings

Participants' ratings of their viewing environments differed substantially between settings with regard to subjective properties of the environment. In brief, home environments were consistently rated higher on pleasantness items, theaters were given higher ratings on half of the affluence items, no differences were found on ratings of aesthetics, and home environments received higher ratings on two of the restfulness items. The means and standard deviation scores for the subjective properties scales are listed in Table 13.

Insert Table 13 about here

Participants in the video conditions rated their viewing environments as more comfortable (P=.01), more convenient (P=.001), softer (P=.001), more personal (P=.001), more cheerful (P=.008), and easier (P=.002), than participants in the theater conditions. The only pleasantness item that did not quite reach significance was cold-warm. Unfortunately, there is more than one possible interpretation of this last scale. Some participants may have evaluated the actual air temperature,

while others evaluated the social ambience of the setting. Participants' scores on the pleasantness scales were generally positive.

On the affluence scales, theaters were rated as more elaborate (P=.004), and unique (P=.001), than home environments. Given the specialized interior of the Princess Theatre, these differences may not be found for conventional theaters. No differences were found between the environments on ratings of richness or pompousness. Ratings on these two scales were fairly neutral which suggests they may not be useful adjectives for describing movie viewing environments.

No differences between environments were found on any of the aesthetics items. The results show that both settings were found to be sufficiently spacious, reasonably clean and fairly beautiful. The consistency of responses between conditions suggests that these environmental properties may be insignificant to the motion picture viewing experience.

Home environments were perceived as natural, whereas, theater environments were perceived as neutral on the artificial-natural scale. On the loud-quiet scale, home settings were rated significantly quieter than theaters (P=.029). It is impossible to tell if home environments are actually quieter or if viewers' standards for quietness are lower in this environment. There is also the possibility that some participants are evaluating aural noise while others are evaluating visual noise. Participants in all conditions rated their viewing environment as slightly more elegant than vulgar.

Material Resources Ratings

Participants' ratings of satisfaction with material resources in the viewing environments did not differ substantially between settings. This result is rather surprising given the presumed technical superiority of the theater environment. Means and standard deviation scores for material resources ratings for each experimental condition are listed in Table 14.

Insert Table 14 about here

Ratings were generally positive, although not excellent, for both environments on the following items: sound quality, picture quality, screen size, film or tape condition, lighting in viewing room. Participants in the video conditions indicated greater satisfaction than theater participants with the seating arrangements and the viewing distance from the screen.

Viewers' Environmental Preferences

The majority of participants (74 percent) reported a preference for theater over video settings for the purpose of viewing motion pictures. Although anticipated, this result seems somewhat surprising in light of participants' ratings of their viewing environments, particularly the apparent satisfaction of video viewers with the material resources of their settings. It appears as though participants are not making comparisons between the two alternative viewing environments unless directly instructed to do so. However, once comparisons are made, the theater environment comes out the strong favorite.

Participants were asked to rate the importance of a variety of aspects of motion picture viewing (such as, screen size, audience, viewing distance), and were instructed to consider the merits of both viewing environments in their assessments. Table 15 lists the mean and standard deviation scores for each of the items.

Insert Table 15 about here

Comfort, picture quality, and sound quality, received the highest ratings from participants. The concession stand was given the lowest rating.

These results also suggest that many of the options made possible by video delivery are not considered important by the participants of this study. For instance, the capacity to fast-forward and rewind had a mean score of 3.31 (the lower the score on a 5 point scale the more important the item was consider to be). Likewise, the opportunity to engage in other activities while viewing received a mean rating of 3.97.

Sub-group Comparisons

Responses to specific items on the questionnaire were tested for possible sub-groups effects using two-tailed T-tests or one-way analyses of variance, depending on the number of groups. Only the combined and individual scores of the artistic merit items were used to test for sub-group differences in reaction to the movies because it was felt that items which did not produce differences between settings were limited in their explanatory power. In respect to sub-group reactions to viewing environments, only responses to the subjective properties items (e.g. comfort, cleanliness, etc.) are used for comparisons. Ratings of material resources (e.g. screen size, picture quality, etc.) are not used because they indicated very few differences in audience reaction between settings. It seems safe to assume that in cases where there is general agreement in the responses collected from all conditions there are no significant sub-group effects.

Gender Differences

No systematic differences were found between the responses of males and females with respect to their reactions to either the movies or the movie viewing environment.

Frequency of Theater Attendance

No sub-group differences were found for either the movie viewed or the viewing environment on the basis of audiences' frequency of theater attendance.

Frequency of Video Viewing

Frequent video viewers, or participants who viewed 4 or more movies on video in the two months prior to the experiment, rated the movies as more entertaining than did participants who viewed 3 or fewer movies, occasional viewers, over the same period. The means, standard deviations, and probability scores of this test are listed in Table 16.

Insert Table 16 about here

No other differences were found between both audiences' reactions to the movie viewed or the movie viewing environment as a function of frequency of video viewing.

Preference for Viewing Environment

Participants who indicated a preference for theater environments rated the movies as more meaningful than participants whose preference was for television/VCR environments. The means, standard deviations, and probability scores of this test are listed in Table 17.

Insert Table 17 about here

This may suggest that people who take movies relatively seriously, at least in respect to finding meaning in them, prefer to view movies in a theater. However, this finding must be interpreted cautiously, as participants in the theater condition were significantly more likely to rate the movies high on meaningfulness. The movie viewing experience they had undergone just prior to filling in the questionnaire was particularly positive in respect to meaningfulness and may have influenced their responses to the viewing location preference question.

No other differences were found between the responses of audience members who prefer theater environments and those who preferred video environments.

Place of Residence

The results indicated that participants' place of residence has no effect on their evaluations of the movies or the movie viewing environment.

Previous Viewings and Previous Viewing Environments

Participants who had seen the movies before on video gave the movies higher ratings on the boring-entertaining scale than other participants. The next highest ratings on this scale were given by participants who had never viewed the movies before, and finally, the participants who had seen the movies in a theater gave it the lowest rating. This last group has only 6 participants and, therefore, may not be representative. Table 18 lists the means and standard deviations for each sub-group on the boring-entertaining scale. Table 19 summarizes the results of a one-way analysis of variance of this data.

Insert Table 18 and 19 about here

No other differences in participants' ratings of the movies artistic merit or in their ratings of the viewing environment were related to previous viewings.

The Viewing Situation

Overall, there were very few differences between the viewing situations in terms of the overt behavior of the viewers. Although the video environment affords the viewer an opportunity to engage in other activities while simultaneously viewing the movie, very few participants reported taking advantage of the situation. Less than 10 percent of the video viewers reported engaging in other activities while the movie was playing. These participants were no more likely to leave the room while

the movie was playing than theater viewers. Likewise, video viewers did not report speaking with companions any more often than did theater viewers. Distractions in the environment were reported with equal frequency in both viewing environments. Eating was just as likely to occur in either viewing environment, although the diversity of foods was much greater in the video environment. More viewers in the video setting reported drinking alcohol prior to or during the movie presentation; however, the numbers were small in either condition, 2 in the theater and 5 in the video.

Many video viewers took advantage of the medium's capacity to stop, pause, and rewind the movie. Over half of the participants in this condition reported replaying part of the movie (53 percent) and even more reported stopping or pausing the movie (61 percent). Only 6 percent reported fast-forwarding any part of the movie.

Equal numbers of video and theater viewers reported time as passing quickly, normally, and slowly. It was hypothesized, based on Mauerhofer's analysis, that theater audiences would perceive time as passing more quickly than video viewers. No evidence of the effect was found in the present study.

Theater participants were asked whether they felt the service of the theater staff was good, adequate, or poor. Only 4 percent indicated that the theater staff was poor, 63 percent indicated the theater staff was adequate, and the remaining 33 percent indicated that they were good. No differences were found between movies.

More participants in the video conditions viewed the movies alone than in the theater conditions: 46 percent versus 31 percent. A greater difference was expected here than was found.

Motion Picture Viewing: General Information

Participants were requested to rate their liking for a variety of film genres on a scale from one to five (a rating of one indicates very high regard, a rating of 3

indicates neutral regard, and a rating of 5 indicates very low regard). The results of this inquiry are listed in Table 20.

Insert Table 20 about here

Comedies were the favorite with a mean score of 1.37. Action/adventure (1.74) and thriller/mysteries (1.83) were also very popular. Martial arts and foreign movies obtained the lowest scores at 3.63 and 3.4, respectively.

Participants were asked if they had a specific movie in mind when they make the decision to attend a theater or view a video. As was expected, people typically decide to attend a theater to view a specific predetermined movie, whereas, people viewing videos decide on the movie after deciding on the activity: 80 percent of participants reported having a specific film in mind in deciding to attend a theater; conversely, only 20 percent reported having a specific video in mind in deciding to view at home.

When asked to rate the importance of the specific theater building, only 13 percent of participants indicated that it had "considerable influence" on their decision to go out to a movie, 61 indicated that it had limited influence, and 26 percent indicated that it had no influence.

When asked whether their theater attendance over the past 2 months accurately reflected their usual theater-going, the majority of respondents in the theater condition reported that it did (59 percent); 24 percent reported that it underestimated usual attendance, and 16 percent reported that it overestimated usual attendance. The same question was posed for video viewing: 68 percent reported that their video viewing over the past 2 months accurately reflected their usual rate of viewing, 18 percent reported that it underestimated usual viewing, and

14 percent reported that it overestimated usual viewing. These figures suggest that video viewing habits may be more stable than theater-going.

In a similar vein, participants reported making the decision to attend a theater further in advance than making the decision to view a video. Only 12 percent of respondents indicated that they usually decide to attend a theater on the "spur-of-the-moment"; 47 percent indicated that this is the usual practice for video viewing. Only 5 percent of participants reported planning a day or more in advance to view a video; 36 percent reported allowing this much advance notice for theater attendance.

Chapter 6

Discussion and Conclusions

It was hypothesized at the beginning of this research that audiences would rate motion pictures more positively if they viewed them in a theater rather than on video. Specifically it was postulated that evaluations of artistic merit and realism would be more positive for theater audiences than for video audiences; no differences were anticipated for enjoyment evaluations. Although the findings provide evidence in partial support of the hypotheses, the rationale behind them appears to have been somewhat faulty.

It was thought that the functional orientation and material resources of the theater environment would give rise to higher arousal and involvement levels on the part of the viewer. These, in turn, were expected to produce more positive ratings. Enjoyment ratings were assumed to be more closely associated with the subjective qualities of the viewing environment, particularly "pleasantness". However, no noticeable effect was expected for enjoyment ratings, as these qualities were presumed to be relatively unimportant to the viewing experience.

The results confirmed the hypothesis that theater viewers would rate the movies more positively with respect to artistic merit. As anticipated, no differences were found between viewing environments in terms of audiences' evaluations of the movies' enjoyment value. Contrary to expectation, no effect was found for realism evaluations.

An examination of the specific items that produced significant differences between the viewing environments suggests that, while the viewers' arousal and involvement levels do seem to be affected by the material resources and functional orientation of the environment, the nature of the influence seems more directed than first anticipated. In essence, it appears as though judgements that are based upon the emotional state of the viewer are more sensitive to the influence of

environmental variables than are judgements based upon the viewer's intellect and good taste. Another way of describing the effect is to say that judgements based on the subjective appeal of the movies are more likely to be affected by environmental variables than judgements based on the objective qualities of the movies. Evidence supporting this interpretation is provided later on.

If this explanation is correct, then the hypothesis stating that enjoyment ratings would not be affected by the viewing environment is unacceptable. These types of judgements are necessarily based on the emotional state of the viewer. An explanation for the discrepancy between the results of this study and this revised postulation are provided further on.

It was also hypothesized that an inverse relationship between viewers' evaluations of the subjective qualities of the viewing environment and their evaluations of the movies would be found. The results confirmed this expectation. Contrary to expectation, viewers in both environments rated their material resources equally. This contradicted the hypothesis stating that a positive relationship would be found between viewers' ratings of the material resources of their environment and their ratings of the movies. Possible interpretations and explanations for these results are discussed below.

Viewing Environment and Audience Reaction to Motion Pictures

Artistic merit

Only half of the artistic merit items produced significant differences between viewing environments; however, these differences were enough to produce a strong main effect for the factor as a whole. This result alone can account for the generally held opinion that viewing motion pictures in a theater is better than viewing them in the home. Theater viewers will actually rate movies as superior. An explanation as to why this effect occurs can be derived from the types of items that recorded differences in audience reactions.

It appears as though there may be two general types of artistic merit judgments, one based on intellect and good taste, and the other based on the affective state of the viewer. In evaluating whether a movie is good or bad, smart or stupid, skillful or unskillful, one need only look to the content of the movie for evidence of the talents of the actors, director, cinematographer, and screenwriter. However, in evaluating whether a movie is entertaining or boring, impressive or unimpressive, meaningful or meaningless, one must look into himself/herself for evidence of an emotional reaction. The reference point changes between the two types of judgments. A given movie may be skillful in that the performances of the actors and the technique of the cinematographer are first rate, but not "moving" in that the audience is not made to feel personally involved in the lives of the characters. If this postulate is true, then the results of this study suggest that judgments based on the affective state of the viewer, during or just after viewing, are more sensitive to the influence of environmental variables than are judgments based on intellect and taste.

Enjoyment

Audiences' ratings of enjoyment items do not appear to be influenced by the viewing environment. Enjoyment ratings were uniformly low across conditions. This finding attests to the reliability of the measurement instrument in that the enjoyment factor rests on the assumption that comedies are inherently more enjoyable than serious drama. Since neither of the movies used in this field experiment were remotely comical, low ratings were expected for this factor.

Logically, the argument made in the preceding section, that environmental variables influence arousal levels which, in turn, influence judgments based on the viewer's affective state, should also apply to judgments of enjoyment. These types of judgments would undoubtedly be based on the affective state of the viewer. That the viewing environment does not appear to be affecting audience enjoyment ratings

is probably due to the fact that the movies employed in this experiment were virtually without comic relief. Consequently, any influence the viewing environment may have on the viewers' judgments would be ineffectual for enjoyment items.

As mentioned in the results section, participants in the theater conditions rated the movies as less serious than video participants on both the humorous-serious and the serious-funny scales. This finding lends support to film journalist, Vincent Canby's (1988) suggestion that some types of movies take on a graver seriousness when viewed at home. The context of the theater renders the movie experience an entertainment event. Even if the movie is particularly frightening, the fear aroused in the viewer can be left in the auditorium once the event is over. At home, on the other hand, the movie intrudes into the viewer's private space. Fear that lingers in this environment can permeate into other aspects of the viewer's life. The same principle may apply to "seriousness".

Alternatively, it may be that people are not used to viewing serious drama via their television sets. Television programming has a tendency to treat the serious side of life rather lightly, even in portrayals of violence and human suffering. When dramas, such as the movies used in this experiment, are viewed on television the viewer may judge the content against usual television fare and thereby deem it especially serious.

Realism

No differences attributable to the viewing environment were found in terms of audiences' ratings on realism items. Potential environmental influences can not be ruled out however, because the movies chosen for this experiment may have elicited somewhat extreme reactions from the viewers. *Blade Runner* is a futuristic movie; some might even classify it as science fiction. As such, it consistently challenges the viewer's imagination. The suspension of disbelief is undoubtedly a more difficult task for this movie than for *The Name of the Rose*. Set in the 14th

century, *The Name of the Rose* is presented as a historical event. The story is given legitimacy through the chronicles of history. If the movies had been more moderate in their believability, it is possible that the viewing environment may have produced differences in the audience ratings. However, such a result would be surprising given the viewers' responses to the artistic merit items.

The quality of realism seems more akin to those artistic merit items which require a response based on intellect rather than those which require a response based on affect. This assumption implies that the viewing environment may not have much of an effect on viewers' ratings of realism. It could be argued that a viewers' affective state serves as a verification of a movie's believability, such that, if a viewer is frightened, then the movie must be reasonably plausible. However, the same may be said of those artistic merit judgments that are supposedly based on affect. For instance, if a movie causes a viewer to feel excited it must have been skillfully produced, directed and acted. In all likelihood the judgments of all three factors are inter-related. Nonetheless, the results of this experiment indicate that environmental variables can effect them differentially.

Interaction Effects

That no interaction effects were found between the viewing environment and the movie viewed, in terms of audience reaction to motion pictures, did not come as a surprise. The similarity of the motion pictures chosen for this experiment likely served to minimize these types of effects. However, if this experiment was replicated using motion pictures of different genres, it would be reasonable to expect interaction effects. The nature and extent of influenced exercised by the viewing environment on audience reaction to motion pictures may be a function of the type of movie viewed. On the basis of this research, it seems reasonable to predict that there would minimal differences between viewing environments in audience's responses to light-hearted movies and significant differences in responses

for serious-minded movies. However, whether the type of motion picture viewed influences the effect of viewing environment can only be answered through further research.

Audiences' reactions to the viewing environments

Subjective Properties

The audiences' ratings of the subjective properties of the viewing environments largely conformed to expectations. Home environments received higher ratings of pleasantness and restfulness, no differences were found on aesthetics items, and theaters were given higher affluence ratings.

Although the in-home viewing environment was regarded more positively overall than the theater environment, this setting never produced more positive ratings in audience evaluations of the movies. In other words, every difference in audience reaction to the movies that was attributable to setting, indicated more positive responses by theater viewers. This result suggests that the subjective properties of the viewing environment have little or no bearing on audience reaction to motion pictures. Indeed, it is possible that an environment's subjective properties have an inverse relationship with movie ratings. If an inverse relationship exists it is likely unidirectional; that is, the more pleasant the environment the less the regard held for the movie. It seems highly unlikely that the reverse would hold true; that is, the more unpleasant the environment the higher the regard held for the movie. The results of this section must be interpreted cautiously as the viewers' discriminatory capacity for evaluating the quality of their viewing environments is brought into question by the results of their ratings of the settings' material resources.

Material Resources

Rather surprisingly, participants' ratings of satisfaction with material resources in the viewing environments did not differ substantially between viewing environments. It was anticipated that in-home audiences would be less satisfied

than theater audiences. This expectation was based on two assumptions: first, that theaters are superior to video settings with respect to material resources; and second, participants would compare their environment with viable alternative environments. In effect, video viewers were expected to judge their viewing environment against theater settings. Likewise, theater viewers were expected to judge their setting against video settings. This second assumption arises out of Stokols and Shumaker's concept of "comparison level" (described in detail in Chapter 3).

The results of this research showed no differences in participants' ratings of material resources between viewing environments. This finding implies that either no comparison is being made (or, at least, acted upon) or, that participants do not acknowledge theaters as superior with respect to material resources. The latter interpretation seems highly unlikely given that the majority of participants report a preference for theater over video viewing. It appears as though viewers' expectations may be tailored to suit the limitations of their present environment. Only past experiences in the same environment appear to be employed in the assessment process.

The notion that audiences' arousal levels may be responsible for differences in audience reactions across experimental conditions is thought to be tied in with the physical properties of the viewing environments. In other words, higher arousal levels are thought to be caused, in part, by the size of the screen, the volume of the sound-track, and other physical aspects of the theater setting. This, in turn, is thought to give rise to more positive responses on affectively-based evaluations of the movie. Unfortunately, it is impossible to discern the source of arousal through the audiences' ratings of the material resources of their viewing environments.

Viewers' Environmental Preferences

Participants' responses indicated four aspects of motion picture viewing as being especially important to the experience: movie choice, sound quality, picture quality, and comfort. Theater settings have the advantage with respect to picture and sound quality. Most home settings have the advantage with respect to comfort. Each environment has different strengths with respect to movie choice. The home environment offers a wider variety, but the theater environment offers the latest titles. Each setting has its advantages and disadvantages. In choosing between them viewers may simply be considering their immediate desires. On many occasions a choice may not even be evident. For instance, if the viewer's foremost desire is to relax then theater viewing may not be considered an option.

Those conveniences offered exclusively by in-home viewing alternatives (e.g. the opportunity to engage in other activities while simultaneously viewing the movie, fast-forward/rewind capacity, availability of alternative foods) appear to be relatively unimportant to most movie viewers. The greatest strengths of the home environment seem to be comfort and low cost. Theater owners may be well advised to make their theaters more comfortable and reduce the cost of admission.

Theaters not already equipped with state-of-the-art sound systems should be upgraded. Likewise, picture quality and screen size should be improved wherever possible. Theater owners might also be well advised to follow Garth Drabinsky's example by placing cafes adjoining concession areas. The results of this study suggest that many movie fans enjoy the social aspect of the movie-going experience. Since it would be counter-productive to allow socializing in the theater auditorium, a place for such activities in the lobby may be attractive to a large number of people.

As television and video technology become increasingly sophisticated and reasonably priced, the theater's advantages will gradually diminish. Should large screen, high-definition television with high-performance sound become

commonplace, the movie viewing public may lose all motivation to attend theaters. This possibility is heightened by new release strategies that place videos on the market at much earlier dates.

Limitations: the Viewing Situation

Although this field experiment employed natural settings, certain elements of the experience were unavoidably contrived. Consequently, the external validity of this experiment may be somewhat weak. For instance, under normal circumstances, video viewers are much more likely than theater viewers to view a movie without a companion (Gunter & Levy, 1987). While this was found to be the case in the present study, the differences between conditions were not large enough to be statistically significant.

Typically, when people make arrangements to go out to the theater, they find a time and movie that is mutually agreeable to all. Participants in this experiment were not given any choice and, therefore, had to persuade potential companions to attend without being given a choice. This task may have been unusually difficult as the scheduling of the movies fell between the end of classes and the beginning of final exams. Time off during this period is a precious commodity for students. In addition, expendable money would be particularly scarce for students so late in the year. Conversely, it may have been particularly easy to persuade friends to view a video, especially room-mates, as the entertainment was free and could be scheduled for a convenient time (i.e. after studying).

It was anticipated that video viewers would engage in conversation more frequently than theater viewers due to the absence of social mores against speaking aloud and because the movie, presumably, would not be as gripping on the small screen. No evidence confirming this expectation was recorded. Of course, there is the possibility that participants may have been paying closer attention than they normally would, out of a sense of obligation to the experimenter.

Another unexpected finding was that video viewers were no more likely than theater viewers to report distractions in their immediate surroundings.

Unfortunately, it is impossible to tell if the environments were equal in this respect or if respondents' sensitivity levels differ from one environment to the other; that is, theater respondents, may have held higher expectations, which may have caused

them to be more sensitive to distractions in the environment than in-home participants.

Despite participants' reports that the capacity to fact forward, pages

Despite participants' reports that the capacity to fast-forward, pause/stop, and rewind is of little importance in the motion picture viewing experience, over half of the video viewers used these functions. The value of these non-essential conveniences may escape the viewers' appreciation due to their unquestioned availability.

Limitations: the Experimental Design

In addition to the problems mentioned above, there are several weakness inherent in the design of this experiment that limit the generalizability of its results to real world events. The most serious of these is the unbalanced variability between the viewing environments. Within the in-home viewing condition the variability between environments was undoubtedly very high. The only variability within the theater condition would have been those aspects of the theater routine that fluctuate as a function of the day of the week, such as: show times, concession and box office staff, previews of up-coming movies and so on. This difference in variability between viewing environments allows for the possibility that confounding variables are responsible for the results of this study. At the same time, this difference reflects the reality of the situation, namely that in-home viewing is a private as opposed to public event. As such the act of movie viewing in the home can be much more unique, or at least, less regulated than in a theater.

Other experimental design limitations include the very small and homogeneous sample population, the specific theater and the specific movies used. Further research with larger and broader samples, more varied movies, and less specialized theaters is required before the conclusions drawn from this study can be confidently applied to general population.

This study could have been improved through the use of a within-subjects design, allowing for counterbalancing between conditions. For example, through the use of the Latin square design one can "gain strength through the consistency of the internal replications of the experiment" (Campbell & Stanley, 1969, p.52). In the case of the impact of setting on motion picture viewing, all participants would view the same movie in a theater as well as viewing another movie at home. Again, the video movie would be the same for all participants. In this manner, the possible influence of confounding variables, such the effects of variability within home viewing environments, can be easily discerned from an examination of the experimental cells. If, for example, less positive ratings of the movies are found for in-home participants, it would be possible to see if this result was due to the expected main effect, or the result of a specific group. If practicality allowed, it would be most beneficial to substitute the video movie for the theater movie for half of the sample. This would allow the experimenter further confidence that the main effect is meaningful with respect to viewing environment and not as a by-product of the specific movies viewed. Of course, the larger the sample size the more reliable the data.

Theory in Review

Audiences' perception of time did not differ significantly between viewing environments. It was anticipated that theater audiences would perceive time as passing more quickly due to the "Cinema Situation" as described by Mauerhofer (1949). He put forth the argument that in a darkened theater, viewers develop a

desire for intensified action, which is normally satisfied by unnaturally fast action on the screen. This situation was presumed to result in an accelerated perception of time. It may be that this effect occurs equally well in the home; or, on the other hand, it may not actually occur in either setting.

Mauerhofer's psychology of film experience

Whether the "Cinema Situation" causes the viewer's unconscious to communicate more freely with his conscious, as postulated by Mauerhofer, can not be confirmed from the results of the present study. However, the finding that participants who prefer theater settings will rate motion pictures as possessing more meaning than participants who prefer video settings, hints that this possibility may have been realized. The heightened perception of meaning recorded by viewers with a preference for theaters may arise out of higher levels of conscious-unconscious interaction. Moreover, the finding that viewers in a theater will produce superior reviews than viewers in a video setting, suggests that something of the viewing experience is lost outside of the cinema, just as Mauerhofer predicted. Exactly what is lost is indeterminable, although it appears to be related to the viewer's arousal levels. In Mauerhofer's terms this might translate in to the absence of passivity and anonymity on the part of the viewer or, a weakening of the viewer's imagination or desire for intensified action, brought on by the presence of aural and visual disturbances.

McLuhan and principles of information processing

In agreement with McLuhan's ideas, the theater viewers in this experiment reported being more emotionally involved in the motion pictures than did the video viewers. Whether this finding is a consequence of the comparative ease of processing high-definition film over low-definition video is unknown at this stage. In addition, whether the theater audience expended their presumed reserved attentional resources towards greater critical evaluation of the movie's content can

not be said. Nonetheless, if the medium is the message, the key point of motion picture theaters seems to be arousal, and the point of television/VCR settings seems to be relaxation.

Mehrabian's emotional dimensions

Results of the studies conducted by Christ and Biggers (1984) and Shapiro and Biggers (1985), employing the theoretical perspective of Albert Mehrabian, implicated the pleasure-displeasure emotional dimension as the most important of the basic dimensions for the television setting, and the arousal-nonarousal dimension as the most important dimension for the theater setting. These findings received some support from the results of the present study.

As mentioned earlier, the differences in audience reaction to the motion pictures between viewing environments is believed to be the result of arousal-eliciting qualities in the theater setting. Pleasure-eliciting qualities in the home setting, however, were not found to effect audience reaction. This finding may be due to several factors. First, this study concentrated on theater programming rather than television programming. It may well be that the nature and extent of environmental influences depends upon the content of the program viewed. In other words, if reactions to regular television programming (or, perhaps, less serious motion pictures) were compared between viewing environments, pleasure-eliciting qualities in the home environment may have given rise to more positive reactions.

Alternatively, it may be that the three basic emotional dimensions operate in a hierarchical manner with the arousal-nonarousal factor as the most potent. In this case, the scarcity of pleasure-eliciting qualities in the theater environment would go unnoticed due to the presence of arousal-eliciting qualities. However, if the television setting, which presumably is inherently low in arousal, was without pleasure-eliciting qualities, their absence would be sorely felt.

If the strength of the three basic emotional dimensions are, in effect, hierarchical, it seems reasonable to assume that, for the motion picture viewing experience, the dominance-submissiveness dimension would be the least influential. This notion is based on the finding that viewers do not recognize the capacity to manipulate the flow of the movie as important to the experience.

The transactional view of settings

The results of this study suggest that the different functional orientations of the viewing environments along with the different relationships between the occupants and these places, give rise to distinctly different viewing experiences. Although both environments provide the means for viewing motion pictures, they do not appear to be in competition with each other. Each offers a unique experience to the viewer. At home, the viewer has greater power over the course of events. He also has a closer relationship with the objects in his surroundings. In the theater, the viewer is more submissive. In a sense, there are two types of viewers within each person, each of which undergoes a different viewing experience within each of the environments.

Summary

It was hypothesized earlier on in this thesis that differences would be found in audiences' reactions to the motion pictures as a function of their viewing environment. In particular, it was anticipated that theater audiences would rate the movies more positively with respect to artistic merit and realism. The first of these expectations was fulfilled, however, not necessarily for the reasons first postulated. The second was not fulfilled. The results suggest that this hypothesis may have been based on faulty premises.

The notion that theater viewers would give the movies higher artistic merit ratings than video viewers was based on the following ideas: the theater environment would produce higher arousal levels in the viewer, the absence of

distractions would allow greater attention to be paid to the movies, and that the "Cinema Situation", as proposed by Mauerhofer, would psychologically prepare viewers for the optimal reception of the movie. Of these postulations the most useful appears to be the production of heightened arousal levels. However, it may be that the "Cinema Situation" was indirectly responsible for the higher ratings of artistic merit found amongst theater viewers. The darkness, the anonymity, and the voluntary passivity of the viewer may be the cause of the heightened levels of arousal which, in turn, are assumed to be responsible for the differences in audience reaction between viewing environments. Exactly what elements of the theater environment give rise to the presumed heightened arousal levels is unknown. The results of audiences' ratings of the importance of various aspects of their settings seems to demonstrate that the viewer is largely unaware of environmental sources of influence. The problem is further complicated by the different standards of evaluation being used by the viewers in the different settings. For instance, the postulation that artistic merit items would show higher ratings for movies viewed in the theater due to a reduced number of distractions in this setting, was defeated by the finding that both experimental groups reported equal incidence of distractions. Whether the home environment actually had equal distractions is unknown. It may be that home viewers have a higher tolerance level for distractions, so that noises and other interruptions that would be considered very intrusive in the theater may go unnoticed in the home environment.

The hypothesis that audiences would rate movies as more realistic when viewed in a theater was not supported by the results. It was argued that the heightened arousal levels that were expected to accompany the theater experience, would cause viewers to suspend their disbelief to a greater degree than home viewers. In fact, there were no differences in audiences' ratings with respect to realism items between viewing environments. After reviewing the results of the

participants' responses to the artistic merit items, it was decided that the initial assumption was incorrect. Realism items were reassessed as judgments based on the viewer's intellect and taste, and therefore not sensitive to the influence of heightened arousal levels.

Audiences' ratings of enjoyment were not expected to be influenced by environmental variables. The reason given for this lack of effect was that the pleasantness of the home environment, which is thought to normally increase occupants' capacity for enjoyment, would not be missed in the theater environment. The results did indeed show that enjoyment ratings were, by and large, not affected by the viewing environment. However, the initial hypothesis was rejected because it was based on an idea later deemed incompatible with the main explanation provided for the results: to reiterate, the theater environment instills higher arousal levels in the viewers which, in turn, influences their affectively-based perceptions of the movie. The reason provided for the absence of this effect for enjoyment items is that the movies used in this study were without sufficient "enjoyment" value.

This study has demonstrated that the viewing environment will effect one's evaluations of the motion pictures. It is a common experience that a friend recommends a movie for video viewing that he or she has seen in a theater. Upon viewing the movie we find ourselves dismayed by the poor taste our friend has shown and congratulate ourselves for not having wasted time and money on viewing it in a theater. This self-righteous attitude is often assumed even though we may willingly admit that viewing a movie in a theater is better than viewing it at home. Somehow we can still believe that we would have been equally unimpressed if we had viewed the movie in a theater. In other words, although we have different expectations of the viewing environments, we do not see these differences as related to our reaction to the content of the movie. In making this assumption we may be only considering those judgments that are based on intellect and good taste, in

which case, we would not be incorrect. However, our experience of a motion picture involves many affective reactions as well. When viewing videos, we may mistakenly be attributing our lack of excitement, involvement, amusement, and so on, to the content of the movie rather than to the context of the viewing environment.

The Future of Theatrical Exhibition

The motion picture viewing experience is, in part, a function of the viewing environment. The results of this study suggest that theater viewing gives rise to a more intensive, affectively oriented experience than does home viewing. The difference between the viewing experiences seems to center around the arousal level of the viewer. Although in-home entertainment systems can potentially be improved in such a manner as to raise the viewer's arousal level, this may not result in audiences being more impressed with movies on video. The source of theatrical arousal has not been established and may well be a complex combination of features. It may be a composite of the physical effort exerted in attending a theater, the risk inherent in paying before viewing, the audience dynamics, the size of the screen, the volume of the sound track, the clarity of the picture, among other things. The nature of the arousal (its raison d'etre), rather than simply the physical state, may be responsible for the differences in audiences' reactions across viewing environments. On the other hand, heightened arousal levels may be all that is necessary in producing more positive audience reaction. If this is the case, audiences will have to be provided with new motivations for going out to the movies.

As an initial effort theater owners should make strides to offer the viewer greater comfort. This could be in the form of better chairs, more leg and elbow room, greater variety of foods, an infant room, and other conveniences currently only available at home. Efforts must be made to improve the atmosphere of theaters. After all, if a person just wanted to view the movie, they could do it at

home. The social aspects of theater attendance should be accentuated. One approach to achieve this result would be to implement promotional strategies that focus on social engagements that may take place at the movies. If theater owners want to make going out to the movies an "in" thing to do, they will have to provide facilities for patrons to see and be seen before or after the movie presentation. Lines ups in cramped lobbies will not suffice.

Needless to say, theaters must continually upgrade their technical resources to compete with the challenge of new home entertainment technologies. The results of this study seem to indicate that screen size has already become less important in the minds of movie fans and it may not be long before standards lower for other aspects of the delivery medium. To combat this trend, theater owners should consider implementing a viewer education and theatrical exhibition advertising campaign. The message of the campaign should include information about the development of projection equipment and its increasing sophistication. Brief historical accounts of famous theaters and theater patrons might aid in selling the idea of going out to the movies. Instead of simply advertising their product, theaters should start advertising their service.

Directions for Research

This research has demonstrated that the environment in which a motion picture is viewed has an effect on the reception of the movie's content. The information gained through this research is limited with respect to the particular motion pictures, the size and composition of the sample, and the specific theater used. In addition, the measurement instrument employed to capture audience reaction to motion pictures needs further study. In short, much has been left uncovered concerning the nature and extent of the viewing environment's influence.

Although the avenues for continued research in this area are numerous, two inquiries seem in need of immediate attention. The first concerns the relationship

between the viewing environment and the type of movie viewed. The possibility that different movie genres may systematically alter the effect of the viewing environment has been mentioned several times through out this thesis. In particular, it has been postulated that movies which do not possess significant emotional appeal may be best viewed in the home environment. These types of movies might fall flat in the arousing climate of the theater. Research investigating this possibility would employ motion pictures from a variety of genres, and test for differences in audience reactions between environments.

The second inquiry of note is the possibility that heightened arousal levels are all that is necessary to produce more positive audience ratings of motion pictures. One method for testing this effect would be to manipulate arousal levels in home and theater audiences and compare their reactions to a given motion picture. Arousal levels could be measured through galvanic skin response and manipulated through mild stimulants or, if possible, increased volume levels and screen size. The second method would be preferable for both ethical and practical reasons. If increased volume levels and screen size at home can produce the same effect as theaters then the problems facing the theater industry are much more serious than they may appear. To ensure that theatrically exhibited motion pictures do not become a thing of the past, the industry will have to make an effort to convince movie fans that there is "something extra" in theater viewing.

Table 1

<u>Principle Component Analysis (Varimax Rotation): Audience Reaction To Motion Picture-all Items</u>

Factor	Eigenvalue	% of Variance	Cumulative % of Variance
1	12.23	36.0	36.0
2	4.45	13.1	49.1
3	2.03	6.0	55.1
4	1.37	4.0	59.1
5	1.26	3.7	62.8
6	1.16	3.4	66.2
7	1.02	3.0	69.2

Table 2

<u>Item Loadings For Factor 1 (Artistic Merit)</u>

Item No.	Loading	Item	Next Highest Loading
27 29 2 25 23 32 30 1 10 11 34 5 28 15 26 19 13 4 18	.89 .86 .85 .79 .78 .75 .75 .70 .70 .67 .65 .62 .61 .60 .58 .43	exciting-dull unimpressive-impressive entertaining-boring superior-inferior weak-strong effective-ineffective unskillful-skilful disappointing-fulfilling smart-stupid great-obscure involving-uninvolving ordinary-special valuable-worthless full-empty imperfect-perfect tasteful-tasteless meaningless-meaningful dynamic-static good-bad	21 Factor 7 .16 Factor 619 Factor 3 .22 Factor 7 .29 Factor 2 .37 Factor 2 .27 Factor 2 .29 Factor 2 .31 Factor 3 .27 Factor 735 Factor 5 .27 Factor 2 .41 Factor 3 .37 Factor 424 Factor 5 .34 Factor 6 .41 Factor 6
		6	1111 40001 2

Table 3

Item Loadings for Factor 2 (Realism)

Item No.	Loading	Item	Next Highest Loading
3	.83	unbelievable-believable	.24 Factor 1
21	.79	realistic-unrealistic	.38 Factor 1
9	.77	possible-impossible	.32 Factor 1
7	.70	artificial-natural	.35 Factor 5

Table 4

<u>Sub-Factors and Item Loadings (Enjoyment)</u>

Item No.	Loading	Item	Next Highest Loading
		Sub-Factor 3 - Physical Presence	
20 6 8	.74 .74 .48	delightful-painful uncomfortable-comfortable condemnable-admirable	.35 Factor 4 .25 Factor 5 .40 Factor 1
		Sub-Factor 4 - Amiability	
17 14 22 31 12	.72 .67 .65 .45 .44	sour-sweet happy-sad unhappy-happy dreary-cheerful comic-tragic	.42 Factor 6 .30 Factor 5 .41 Factor 3 .43 Factor 5 .39 Factor 3
24 16	.87 .79	Sub-Factor 5 - Comic Value serious-funny humorous-serious	13 Factor 1 .23 Factor 4
. 33	.77	Sub-Factor 6 - Rigidity stiff-relax	.27 Factor 3

Table 5

<u>Principle Components Analysis (Varimax Rotation): Subjective Properties Of Viewing Environment</u>

Factor	Eigenvalue	% Of Variance	Cumulated % Variance
1	6.29	37.0	37.0
2	2.55	15.1	52.1
3	1.17	6.9	58.9
4	1.08	6.3	65.3

Table 6

<u>Item Loadings for Subjective Properties Factors</u>

Item No.	Loading	Item	Next Highest Loading
	,	Factor 1 - Pleasantness	***************************************
		1 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2	
7 6 13	.79 .77 .73	comfortable-uncomfortable convenient-inconvenient soft-hard	.41 Factor 3 .21 Factor 4 .34 Factor 3
2	.72	personal-impersonal	.24 Factor 3
2 17	.65	warm-cold	.13 Factor 3
4	.65	dreary-cheerful	.31 Factor 4
11	.59	difficult-easy	.41 Factor 4
		Factor 2 - Affluence	
8	.88	plain-elaborate	.08 Factor 1
16	71	pompous-humble	.20 Factor 4
15	.67	unique-common	39 Factor 1
. 3	.55	rich-poor	.43 Factor 1
		-	
•		Factor 3 - Aesthetics	
1	.79	cramped-spacious	26 Factor 1
9	.72	clean-dirty	.30 Factor 1
14	.56	beautiful-ugly	.47 Factor 4
			•
		Factor 4 - Restfulness	
5	.79	loud-quiet	.19 Factor 1
10	.51	vulgar-elegant	.49 Factor 3
12	.43	artificial-natural	.37 Factor 2

Table 7

Analysis Of Variance (Summary Table): Combined Artistic Merit Items

Source	Sum of Squares	Degrees of Freedom	Mean Squares	F Ratio	Prob- ability
Viewing Environment(A)	6.437	1.	6.437	7.112	.009
Movie Viewed(B)	1.885	1.	1.885	2.083	.153
Interaction(AB) S-Within	0.117 77.836	1. 86.	0.117 0.905	0.129	.720

Table 8

Means and Standard Deviations (Artistic Merit Items)

		Thea	ter		· Video				
Item*	Name of the	Name of the Rose		Blade Runner		Rose	Blade Runner		
	Mean	Std. Dev.	Mean	Std. Dev.	Mean	Std. Dev.	Mean	Std. Dev.	
Disappointing-fulfilling	5.86	1.08	4.84	1.63	5.0	1.6	4.86	1.08	
Boring-entertaining	5.91	1.07	5.76	1.71	5.07	1.88	5.27	1.08	
Static-dynamic	5.52	0.90	6.04	1.24	4.86	1.42	5.15	1.66	
Ordinary-special	5.70	0.94	5.8	1.23	4.92	1.26	5.04	1.43	
Condemnable-admirable	5.17	1.67	4.48	1.12	4.65	1.41	4.5	.95	
Stupid-smart	6.0	1.0	5.08	1.28	5.23	1.53	5.15	1.49	
Obscure-great	4.96	1.26	5.0	1.5	4.69	1.69	4.27	1.34	
Meaningless-meaningful	6.35	1.03	5.76	1.2	5.27	1.37	4.69	1.76	
Empty-full	5.52	1.34	5.24	1.2	5.39	1.47	4.42	1.58	
Bad-good	5.30	1.61	4.84	1.87	5.35	1.74	5.00	1.36	
Tasteless-tasteful	5.52	1.28	4.72	1,1	4.96	1.37	4.46	1.33	
Weak-strong	6.17	.83	5.2	1.23	5.58	1.45	4.81	1.20	
Inferior-superior	5.52	1.08	5.04	1.1	5.08	1.41	4.73	1.15	
Imperfect-perfect	4.64	.95	4.24	1.23	4.35	1.26	4.08	1.20	
Dull-exciting	5.87	.97	5.92	1.41	4.81	1.6	5.12	1.61	
Worthless-valuable	5.52	1.08	5.36	1.22	5.1	1.3	4.58	1.27	
Unimpressive-impressive	5.96	.98	5.8	1.55	5.0	1.67	4.96	1.59	
Unskillful-skillful	5.65	1.07	5.68	1.57	5.35 ·	1.16	5.12	1.07	
Ineffective-effective	6.4	.72	5.6	1.26	5.23	1.45	4.89 '	1.42	
Uninvolving-involving	6.26	1.01	5.64	1.29	5.23	1.61	4.92	1.74	

^{*} some scales have been reversed to ensure consistency, such that the higher the score the more positive the reaction.

Table 9

Analysis Of Variance (Summary Table): Combined Enjoyment Items

Source	Sum of Squares	Degrees of Freedom	Mean Squares	F Ratio	Prob- ability
Viewing Environment (A)	.341	1.	.341	.543	.463
Movie Viewed (B)	.089	1.	.089	.142	.708
Interaction (AB) S-Within	.643 60.374	1. 96.	.634 .629	1.01	.318

Table 10

Means and Standard Deviations (Enjoyment Items)

Item*	Theater `				Video			
	Name of the Rose		Blade Runner		Name of the Rose		Blade Runner	
	Mean	Std. Dev.	Mean	Std. Dev.	Mean	Std Dev.	Mean	Std. Dev.
Sub-factor 3								
painful-delightful	3.35	1.53	3.4	1.39	3.65	1.16	3.89	1.11
ncomfortable-comfortable	3.61	1.59	3.6	1.69	4.0	1.47	3,77	1.03
ondemnable-admirable	5.17	1.67	4.48	1.12	4.65	1.41	4.5	.95
Sub-factor 4								
our-sweet	3.65	1.52	3.6	1.0	3.0	1.31	3.58	.70
ad-happy	3.26	1.48	3.12	1.27	3.19	1.67	3.23	1.24
пһарру-һарру	3.61	1.12	3.08	1.08	3.23	1.42	3.58	1.21
reary-cheerful	3.22	1.67	3.04	.98	2.73	1.51	2.85	1.22
agic-comic	2.74	1.29	2.68	1.80	2.69	1.32	2.73	1.19
ub-factor 5								
erious-humorous	2.96	1.46	2.36	1.08	2.08	1.16	2.23	1.28
erious-funny	2.44	1.2	2.4	1.56	1.77	.86	2.12	1.28
·	•		_ . .	_,,,,	****		2,12	LLIT
ub-factor 6						i	•	
tiff-relaxed	3.13	1.33	3.6	1.38	2.85	1.35	3.42	1.07

some scales have been reversed to ensure consistency, such that the higher the score the more positive the reaction.

Table 11

Analysis of Variance (Summary Table): Combined Realism Items

Source	Sum of Squares	Degrees of Freedom	Mean Squares	F Ratio	Prob- ability
Viewing Environment (A)	0.000	1.	0.000	0.000	.999
Movie Viewed (B)	51.142	1.	51.142	33.103	.001
Interaction (AB) S-Within	1.328 146.768	1. 95.	1.328 1.545	.86	.356

Table 12

Means and Standard Deviations (Realism Items)

-		Theater				Video			
Item*	Name of the Rose		Blade Runner		Name of the Rose		Blade Runner		
	Mean	Std. Dev.	Mean	Std. Dev.	Mean	Std. Dev.	Mean	Std. Dev.	
impossible-possible	5.91	1.20	4.36	2.08	5.77	1.37	4.54	1.45	
unrealistic-realistic unbelievable-believable artificial-natural	5.35 5.18 4.74	1.5 1.53 1.34	4.68 4.16 2.92	1.75 1.99 1.47	5.56 5.31 5.23	1.34 1.52 1.51	4.0 3.96 2.69	1.72 1.51 1.38	

^{*} some scales have been reversed to ensure consistency, such that the higher the score the more positive the reaction.

Table 13

Means and Standard Deviations (Subjective Properties of Viewing Environment)

•	Theater				Video			
Item*	Name of the Rose		Blade Runner		Name of the Rose		Blade Runner	
	Mean	Std. Dev.	Mean	Std. Dev.	Mean	Std. Dev.	Mean	Std. Dev.
Factor 1								
incomfortable-comfortable	4.96	1.75	5.79	1.69	6.31	1.41	6 10	1 45
nconvenient-convenient	4.96	1.43	5.33	1.61	6.08	1.16	6.12 6.31	1.45 97
nard-soft	3.96	1.22	4.79	1.38	5.42	1.63	5.31	1.69
mpersonal-personal	3.91	1.65	4.50	1.5	6.12	1.37	5.77	1.59
old-warm	4.91	1.35	4.92	1.32	5.46	1.58	5.77 5.39	1.58
reary-cheerful	4.30	1.46	4.04	1.43	4.85	1.69	5.15	1.53
lifficult-easy	4.17	1.50	4.42	1.02	5.15	1.46	5.15	1.43
Factor 2								
olain-elaborate	4.78	1.88	5.08	1.64	4.19	1.1	3.85	1.46
iumble-pompous	4.22	1.38	4.13	1.19	4.23	.95	4.69	1.40 1.19
ommon-unique	5.87	1.46	5.63	1.56	4.19	1.78	4.12	1.19
poor-rich	4.3	1.36	4.75	1.36	4.85	1.16	4.12	1.8
Factor 3				_				
ramped-spacious	4.35	2.12	5.0	1.91	4,92	1.67	4.81	1.86
irty-clean	4.74	1.45	5.5	1.38	5.81	1.3	5.04	1.73
gly-beautiful	4.57	1.38	5.04	1.4	4.77	1.78	4.69	
					7,77	1.70	7.07	1.23
Cactor 4								
oud-quiet	4.87	1.36	4.08	1.95	5.19	1.74	5.31	1.81
ulgar-elegant	4.70	1.43	4.79	1.06	4.54	1.07	4.27	1.08
rtificial natural	4.0	1.45	4.04	1.27	5.27	1.54	5.04	1.08

Table 14

Means and Standard Deviations (Material Resources Ratings): Level of Satisfaction

	Theater				Video			
Item*	Name of the Rose		Blade Runner		Name of the Rose		Blade Runner	
	Mean	Std. Dev.	Mean	Std. Dev.	Mean	Std. Dev.	Mean	Std. Dev.
	3							
Sound quality	3.83	1.01	3.68	1.28	3.46	1.36	3.77	1.14
Picture quality	3.7	1.11	4.2	.82	3.96	1.08	3.92	.94
Screen size	3.3	1.15	3.64	1.38	3.42	1.10	3.19	1.20
Film or tape condition	3.44	1.08	3.72	.98	3.81	.98	3.52	1.42
Seating arrangements	3.78	1.2	4.08	· 1.04	4.5	.58	4.15	.97
Lighting (in viewing room)	4.09	1.16	3.96	1.1	4.19	.85	4.12	.86
Viewing distance	3.61	1.27	3.88	1.3	4.39	.64	4.23	.91

^{*} ratings were made on scales ranging from 1 (not at all satisfactory) to 5 (completely satisfactory).

The Importance* Of Various Aspects of Motion Picture Viewing

Table 15

Item Mean Std. Dev.	
Variety of titles 1.88 .91 Control over scheduling 2.91 1.13 Opportunity to get out 2.8 1.16 Stop, pause, f-forward, rewind 3.31 1.14 Expense 2.28 1.3 Screen size 2.42 1.04 Comfort 1.61 .65 Informality 2.72 .93 Sociability 2.66 1.0 Audience 2.84 1.04 Other activities** 3.97 .98 Concession stand 3.95 1.06 Picture quality 1.56 .7 Other foods*** 3.64 1.14 Sound quality 1.56 .70 Privacy 3.05 .91	

All responses were collected on scales ranging from 1 (very important) to 5 (not at all important)
Questionnaire read "Opportunity to engage in other activities simultaneously"
Questionnaire read "Opportunity to consume foods and beverages not offered in the theatres" (e.g. alcohol, pizza)

Table 16

Two-Tailed T-Test: Reactions on the Boring-Entertaining Rating Scale* by Frequency of Video Viewing

Video Viewing	No. of Cases	Mean	Std. Dev.	Std. Error	T Value	D.F.	Prob.
Occasional**	43	4.93	1.98	.30	,	<i>(</i> 7.00	006
Frequent***	56	5.91	1.25	.17	-2.84	67.00	.006

- * Responses were collected on a 7 point scale; the higher the score the more positive (entertaining) the response.
- ** Occasional video viewers are defined as those participants who watched 3 or fewer videos in the two months preceding the experiment.
- *** Frequent viewers watched 4 or more videos in the preceding two months.

Table 17

Two-Tailed T-Test: Reactions on the Meaningless-Meaningful Scale* by Preferred Viewing Environment

Preference	No. of Cases	Mean	Std. Dev.	Std. Error	T Value	D.F.	Prob.
Video	26	4.88	1.72	34	2.10	06.45	
Theatre	73	5.7	1.35	.16	-2.18	36.47	0.36

^{*} Responses were collected on a 7 point scale (1 indicating meaningless, 7 indicating meaningful).

Table 18

Means and Standard Deviations (Previous Viewing): Reactions on the BoringEntertaining rating scale*

Group	No. of Cases	Mean	Std. Dev.
No prior view	67	5.36	1.7
Prior view video	25	6.08	.95
Prior view theater	6	4.33	2.94

^{*} responses were collected on a 7 point rating scale: 1 indicating boring and 7 indicating entertaining.

One-Way Analysis Of Variance (Summary Table): Reactions on the Boring-Entertaining Rating Scale* by Previous Viewing

Table 19

Source	Degrees of Freedom	Sum of Squares	Mean Squares	F Ratio	Prob- ability
	**********	***********			
Between Groups	2	17.89	8.94	3.31	.04
Within Groups	95	256.58	2.7		
Total	97	274.46			

^{*} responses were collected on a 7 point rating scale: 1 indicating boring and 7 indicating entertaining.

Table 20

Participants' Liking* For Motion Picture Genres

Genre Mean Std. Dev. Horror Action/Adventure Comedy Drama 3.04 1.3 1.74 .87 1.37 .61 1.97 .96 Martial Arts
Thriller/Mystery
Romance
Foreign 3.63 1.3 .89 1.08 3.4 1.12

^{*} Responses were collected on a 5 point scale: 1 indicates high regard, 5 indicates low regard

References

- Allen, R. C. (1985). The movies in vaudeville: Historical context of the movies as popular entertainment. In Tino Balio (Ed.), *The American film industry* (pp. 57-82). Madison, Wisconsin: University of Wisconsin Press.
- Austin, B. A. (1981). Film attendance: Why college students chose to see their most recent film. *Journal of Popular Film and Television*, 9, 43-49.
- Austin, B. A. (1986). The film industry, its audience, and new communication technologies. In B.A. Austin (Ed.), *Current research in film: Audiences, economics, and law* (pp. 80-116). Norwood, New Jersey: Albex Publishing Corporation.
- Balio, T. (1985). A mature oliogopoly, 1930-1948. In Tino Balio (Ed.), *The American film industry* (pp. 253-284). Madison, Wisconsin: The University of Wisconsin Press.
- Balio, T. (1985b). Retrenchment, reappraisal, and reorganization, 1948-. In Tino Balio (Ed.), *The American film industry* (pp. 253-284). Madison, Wisconsin: The University of Wisconsin Press.
- BBM Bureau of Measurement. (1988). VCR penetration in Canada *BBM Fall 1988 TV*. (Available from BBM Bureau of Measurement, 1500 Don Mills Road, Suite 305. Don Mills, Ontario).
- Black, A. (1986). Garth Drabinsky's pleasure domes. Forbes, 137(12), pp. 90-94.
- Campbell, D.T., & Stanley, J. C. (1969). Experimental and quasi-experimental design for research. Chicago: Rand McNally and Company.
- Canby, V. (1988, February 21). At home the story's different. New York Times, pp. H23, H29.
- Caplan, R. E. (1975). Investigation of the dimensions of an instrument for measuring audience reaction to motion pictures (Doctoral dissertation, Wayne State University). *Dissertation Abstracts International*, 36, 7013A-7242A. (University Microfilms No. DDJ76-10926).

- Christ, W. G., & Biggers, T. (1984). An exploratory investigation into the relationship between television program preference and emotion-eliciting qualities: A new theortical perspective. Western Journal of Speech Communication, 48(3), 293-307.
- Cook, J. T. (1984, February). Video virgins: why thousands of young entrepreneurs are mainlining movies. *Canadian Business*, pp. 14, 16.
- Coughlan, R. (1951, August). Now it is trouble that is supercolossal in Hollywood. *Life*, pp. 102-108, 111-112, 114.
- Dailies fuel exhib fear of fans lost to stay-at-homes: Menace of cheap cassettes. (1981, November 18). Variety, pp.5, 32.
- Deely, Micheal (Producer), & Scott, Ridley (Director). (1982). Blade Runner [Film]. Warner Brothers Corporation.
- DeFleur, M. L., & Ball-Rokeach, S. (1983). *Theories of Mass Communication*, (4th. ed.). New York: Longman Inc.. Denby, David. (1988, June 10). Fatal attraction: The VCR and the movies. *New York*, pp. 29-39.
- Eichinger, B. (Producer), & Annaud, J. J. (Director). (1986). The Name of the Rose [Film]. 20th Century-Fox Film Corporation.
- Film subject matter looms large in stay-away; Ticket prices are related to age: Income strata. (1981, November 18). *Variety*, pp.5, 32.
- Gallup check re likes: Theatre, and/or, homes. (1977, May 25). Variety, pp. 13, 38.
- Getting them back to the movies. (1955, October). Business Week, pp. 58, 60, 63.
- Guback, T. (1987). The evolution of the motion picture theatre business in the 1980's. Journal of Communication, 37(2), 60-77.
- Gunter, B. & Levy, M. (1987). Social context of video use. American Behavioral Scientest, 30(5), 486-494.

- Hall, B. M. (1961). The best remaining seats. New York: Clarkson N. Potter Inc.
- Harmetz, Aljean. (1988, January 10). Now playing: The new Hollywood. New York Times, sec. 2., p. 1.
- Hartman, C. (1986, October). A night at the movies. *Inc.*, 8(10), pp.100, 103-104, 106.
- How TV is revolutionizing Hollywood. (1983, February). Business Week, 2778, pp.78-80, 84, 89.
- Jowett, G. S. (1974). The first motion picture audiences. *Journal of Popular Film*, 3, 39-54.
- Lachman, R., Lachman, J., & Butterfield, E. (1979). Cognitive psychology and information processing: An introduction. Hillsdale, New Jersey: Lawrence Erlbaum Associates, Publishers.
- Luther, R. (1951). Television and the future of motion picture exhibition. Film Quarterly, 5, 164-177.
- Mauerhofer, H. (1949). Psychology of film experience. *The Penguin Film Review*, 2,(8), pp. 103-109.
- McLuhan, M. (1964). Understanding media: The extensions of man (2nd. ed.). Scaraborough, Ontario: Mentor Books.
- McQuail, D. (1987). Mass communciation theory, an introduction (2nd. ed.). London, England: Sage Publications Ltd.
- Mehrabian, A. (1976). Public places and private spaces: The psychology of work, play, and living environments. New York: Basic Books Inc., Publishers.
- Mercey, A. (1947). Social uses of the motion picture. Annals of the American Academy of Political and Social Science, 250, 98-104.

- Merritt, R. (1985). Nickelodeon theaters, 1905-1914: Building an audeince for the movies. In Tino Balio (Ed.), *The American film industry* (pp. 83-102). Madison, Wisconsin: The University of Wisconsin Press.
- Morrison, C. (1974). From nickelodeon to picture palace and back. *Design Quarterly*, 93(13), 6-7.
- Morrow, S. (Director). (1988 November). A Princess Theatre fact sheet. (Available from Princess Theatre, 10337 Whyte Avenue Edmonton, Alberta T6E 1Z9).
- Movie screens are popping up all over. (1984, May). Business Week, 2842, pp. 76, 81.
- Now playing: Pre-recorded videotape sales. (1987, April). Discount Merchandiser, 27(4), pp. 56, 58.
- Schlanger, B., & Hoffberg, W. A. (1951). Effects of television on the motion picture theater. Journal of the Society of Motion Picture and Television Engineers, 56, 39-43.
- Shapiro, M. E., & Biggers, T. (1987). Emotion-eliciting qualities in the motion picture viewing situation and audience evaluations. In B. Austin (Ed.), Current research in film: Audiences, economics, and law, vol.3, (pp. 1-11). Norwood, New Jersey: Albex Publishing Corporation.
- Sharp, D. (1969). The picture palace. London: Hugh Evelyn.
- Shaw, M. E. P. (1976). Group dynamics: The psychology of small group behavior. New York: McGraw-Hill.
- Sherman, S. P. (1986, January 20). Movie theaters head back to the future. Fortune, 113(2), pp. 90-94.
- Statistics Canada. (1985-1986). Culture statistics: Film industry, preliminary statistics. (Catalogue No. 87-204 Annual). Ottawa, Ontario: Statistic Canada.

- Stokols, D., & Shumaker, S. (1981). People in places: A transactional view of settings. In John Harvey (Ed.), Cognition, social behavior, and the environment (pp. 441-480). Hillsdale, New Jersey: Lawrence Erlbaum Associates, Inc., Publishers.
- Strike, C. (1988). The film industry in Canada. Canadian Social Trends, 9, pp. 14-16.
- Study blames TV for theatre drop. (1958, February). Broadcasting, p.58.
- Taub, S. (1983, July). Sunny skies ahead for the old dream machine. *Financial World*, pp.46-50.
- Why folks go to, stay from, pics. (1974, June 26). Variety pp. 7, 30.
- Williams, W., Jr., & Shapiro, M. E. (1985). A study of the effects of in-home entertainment alternatives on film attendance. In B. A. Austin (Ed.), *Current research in film: Audiences, economics, and law* (pp. 93-100). Norwood, New Jersey: Albex Publishing Corporation.
- Zillmann, D., Weaver, J.B., Mundorf, N., & Fust, C. F. (1986). Effects of an opposite gender companion's affect to horror on distress, delight, and attraction. Journal of Personality and Social Psychology, 51(30, 586-594.

Appendix

The Questionnaire

There are 4 versions of the questionnaire, one for each movie in each viewing environment. Part I, questions 9, 10, and 11, differ according to which movie was viewed. Both sets of questions have been included in this appendix. They are set apart by dashed lines and are appropriately labelled. Part IV differs according to viewing environment. Again, both version are included here, set apart by dashed lines and appropriately labelled. In every other respect the 4 versions of the questionnaire were identical.

The purpose of this questionnaire is to assess the motion picture viewing experience. The questions that follow have been constructed to measure your thoughts and feelings regarding motion pictures, and in particular, your evaluation of the motion picture you have just viewed. It is important that we have your honest and thoughtful impressions. Please read all instructions carefully and answer all questions. Your responses will be kept strictly confidential.

PART I

	Please check the appropr	riate alternative:	
1.	Age years		
2.	Sex male female []		
3.	Marital status single	divorced, widowed []	married, common-law []
4.	Residence parent's rent home alone []	rent shared accommodation	own home []
5.	Write the title of the m research project.	ovie you viewed for	this
6.	Have you ever viewed thi	s movie before?	
	[] no (go to question 9)	
	[] once		•
•	[] twice	,	
	[] three or more times	•	

7.	If you have seen this movie before, where did you first view it?
	[] in a private residence via a videocassette player
	[] in a private residence on broadcast television
	[] in a motion picture theater
	[] other locations (e.g., airplane)
	Specify
8.	How long has it been since you <u>last</u> saw this movie?
	[] within the last month
	[] one to two months ago
	[] three to four months ago
	[] five to six months ago
	[] seven or more months ago
	NAME OF THE ROSE
	INSTRUCTIONS:
	Please provide a brief written answer to the following three questions.
9.	Which character narrates the story?
ío.	Why are the Franciscan Brothers visiting the Abbey?
11.	What punishment does the Inquisition force on the three convicted heretics?

	BLADE RUNNER
	INSTRUCTIONS:
	Please provide a brief written answer to the following three questions.
9.	When and where does the story take place?
10.	What is the job of a Blade Runner?
11.	Why have the replicants returned to earth?
	·

	PART II
meas	Following is a set of scales which are designed to ure your reaction to the movie you have just viewed. se make your judgments based on your reaction to the e.
	INSTRUCTIONS:
of t	If the movie you viewed is very closely described by one he adjectives at the end of the scale you should place check-mark as follows:
A	ctive : X: : : : : : : : : : : : Passive
A	ctive ::::X_: Passive
adje	If the movie seems only slightly related to one of the ctives, you should check as follows:
;	Safe: : : X : : : : : : : : : : : : : : : :
	Sàfe · · · · · · · · · · · · · · · · · · ·

unrelated to the movie, then you should place your checkmark in the middle space. Fair :___:__:___:___:___:___: Unfair IMPORTANT: (1) Place your check-marks in the middle of spaces, not on dividers; (2) Be sure you check every scale, do not omit any; (3) Never put more than one check-mark on a single scale; (4) Work as quickly as possible, check-off your first impression, do not ponder your decision. Disappointing: ___:__:__:Fulfilling Entertaining: ___: __: Boring Unbelievable: ___:__:__: Believable Dynamic:___:__:__:__:Static Ordinary:___:__:__:__:__:Special Uncomfortable: ___:__:__:__:Comfortable Artificial:___:__:__:__:__:Natural Condemnable: ___:__:__:__:Admirable Possible: ___:__: Impossible Great:___:__:__:__::__::0bscure Comic:___:__:__:Tragic Meaningless:___:__:__:__:Meaningful

If the movie you viewed is described equally well by the adjectives at the end of the scale, or if the adjectives are

парру:	··	·	:	:_	— : —	:	_:Sad
Full:	·	:	:		:	:	_:Empty
Humorous:	:	:	÷	<u> </u>	:	:	_:Serious
Sour:	:	:	÷	:	<u> </u>	:	_:Sweet
Good:	:	:	:	:	:_	:	_:Bad
Tasteful:	:	:	:	:	:	:	_:Tasteless
Delightful:	:_	:	:	:	:	: ·	_:Painful
Realistic:	:	:	:	· • · · ·	:	:	_:Unrealistio
Unhappy:	:	:	:	:	_:_	_:	_:Happy
Weak:	:	:	:	:	:	:	_:Strong
Serious:		:	:	· ·	:	· :	_:Funny
Superior:	:	:	·_:_		<u> </u>	:	_:Inferior
Imperfect:	:_	:	÷	• <u></u>	·	_:	_:Perfect
Exciting:	:	:	:	:	:	*	_:Dull
Valuable:	•	:	:	<u> </u>	<u> </u>		_:Worthless
Unimpressive:	:	• <u></u>	:	:	:	:	_:Impressive
Unskillful:	:	:		:		_:	_:Skillful ·
Dreary:		*	_:	_:	_:_	·	_:Cheerful

Effective:	:-	:	:	:	:	:	:Ineffective
Stiff:	:	:	:	_:	:	;	:Relaxed
Emotionally Involving:	:	:	_:	:	:	:	Emotionally:Uninvolving
*******	*****	****	****	****	****	****	*****
]	PART 1	III			
In this sec impression of the Please make you of the setting	the env ir judg	vironme ments	ent ir based	which on y	ch you our r	vie	wed the movie.
INSTRUCTION	1s:					•	•
Same as abo	ove.	•					
Cramped:	<u> </u>	·			::		:Spacious
Personal:	:	:	::		::	-	:Impersonal
Rich:	:	.=;	::		·:		:Poor
Dreary:	:		::	:	•		:Cheerful
Loud:	:	.*	::		::		:Quiet
Convenient:	*		· ;	:	:		:Inconvenient
Comfortable:	:	.::	: :	:			Uncomfortable
Plain:		.•;	::	:	:		Elaborate
Clean:	_:	·:	::	:	:		Dirty

Vulgar:	:	_:	_ :	_ :	_•	_:	_:Elegant
Difficult:	_:	_:	_ :		_•	_:	_:Easy
Artificial:	:	:	:	:	:	•	:Natural
Soft:	_:	_;	_:	:	_:	_:	_:Hard
Beautiful:	_:		_:		_ :	_:	_:Ugly
Unique:	_•	_•	_:	_:		_:	_:Commonplace
Pompous:	<u>.</u> :	_:	_:	_:	_:		_:Humble
Warm:	_÷	_•	_:	_:	_:		_:Cold
On a scale : environment on picture viewing being neutral,	from o the fo (one	ollowi beind	ing t 7 not	echnic at a	cal as ll sa	spects tisfac	ctory, three
sound quality not at all satisfactory	-	_:;	· :	: _	4	5	completely : satisfactory
Picture qual	-						
not at all satisfactory	:1	: <u></u>	·	: _	4	5	completely satisfactory
Screen size							
not at all satisfactory	:	_: <u></u>	· •	3::	4	5	completely : satisfactory

film or tape condition	
not at all completely satisfactory:::: satisfactor	Ϋ́
Seating arrangements	
not at all completely satisfactory: 1 2 3 4 5	У
Lighting (in viewing room)	
not at all completely satisfactory:::: satisfactor	У
Viewing distance from screen	
not at all completely satisfactory: 1 2 3 4 5	.Х

PART IV	•
The following questions address your experiences while attending this movie.	
VIDEO CONDITION	-
INSTRUCTIONS:	
Please check the appropriate space.	

1.	If anyone viewed this movie with you, check the space(s) that best describes your relation to your companion(s).
	[] no companions
	[] sibling(s)
	[] parent(s)
	[] spouse
	[] boyfriend/girlfriend
	[] friend(s)
2.	Did you eat any of the following foods or beverages? If yes, please check every item consumed.
	[] did not eat any foods or beverages
	[] popcorn
	[] candy
	[] soft drinks
	[] alcoholic beverages
	[] other
	Specify
3.	Did you engage in any other activities while viewing this movie? If so, please check each space that describes an activity you participated in while viewing the movie.
	[] did not participate in other activities
	[] domestic chores
	[] social activities (e.g. playing cards, etc.)
	[] crafts/hobbies
	[] school work
	[] employment related work
	[] other
	Specify

• •	consume any form of intoxicant?
	yes no
5.	Did you at anytime speak to a companion or anyone else while the movie was playing?
	never rarely occasionally frequently [] [] []
6.	Did you at anytime leave the room while the movie was playing?
	[] did not leave the room (Go to question #8)
	[] left the room once
	[] left the room more than once
7.	In total, approximately how long were you absent from the room while the movie was playing?
	[] less than 5 minutes
	[] between 5 and 10 minutes
	[] more than 10 minutes
8.	Did you at anytime stop or pause the movie?
	[] never (Go to question 10)
•	[] once
	[] two or more times
9.	For approximately how long in total did you stop or pause the movie?
	[] less than 5 minutes
	[] between 5 and 10 minutes
	[] more than 10 minutes

	. Did you at anytime replay part	or the movie:
	yes ·	no []
1-1.	Did you fast-forward the video the movie (excluding credits)?	to skip over any part of
	yes []	no []
12.	Were you at anytime distracted you (e.g. telephone calls, peop	by disturbances around le leaving or entering)?
	never rarely occasio	nally frequently []
13.	During the playing of the movie	, did time seem to pass:
	quickly at a normal p	ace slowly []
	THEATER CONDITION	TTON
	THEATER CONDI	TION
	INSTRUCTIONS:	
1.	INSTRUCTIONS:	ace. is movie, check the
1.	INSTRUCTIONS: Please check the appropriate space (s) that best describes you	ace. is movie, check the
1.	INSTRUCTIONS: Please check the appropriate space (s) that best describes you companion(s):	ace. is movie, check the
1.	INSTRUCTIONS: Please check the appropriate space (s) that best describes you companion(s): [] no companions	ace. is movie, check the
1.	<pre>INSTRUCTIONS: Please check the appropriate space If anyone accompanied you to the space(s) that best describes you companion(s): [] no companions [] sibling(s)</pre>	ace. is movie, check the
1.	<pre>INSTRUCTIONS: Please check the appropriate space If anyone accompanied you to the space(s) that best describes you companion(s): [] no companions [] sibling(s) [] parent(s)</pre>	ace. is movie, check the
1.	<pre>INSTRUCTIONS: Please check the appropriate space If anyone accompanied you to the space(s) that best describes you companion(s): [] no companions [] sibling(s) [] parent(s) [] spouse</pre>	ace. is movie, check the

2.	while at the theater? If yes, please check the space for each item purchased.
	[] did not purchase any foods or beverages
	[] soft drinks
	[] popcorn
	[] candy
,	[] other
	Specify
3.	How would you rate the service of the theater staff?
	good adequate poor
4.	Where in the auditorium did you sit?
	[] first ten rows
	[] middle section
	[] toward the back
	[] in the balcony
5.	Were you ever distracted from the movie by disturbances around you (e.g. people talking or fidgeting, etc)?
	never rarely occasionally frequently [] [] []
6.	Did you at anytime leave the auditorium while the movie was playing?
	[] did not leave auditorium (Go to question #8)
	[] left auditorium once
	[] left auditorium more than once

the auditorium while the movie was playing?
[] less than 5 minutes
[] between 5 and 10 minutes
[] more than 10 minutes
8. Did you at anytime speak with a companion or anyone els while the movie was playing?
never rarely occasionally frequently [] [] []
9. During the playing of the movie, did time seem to pass:
<pre>quickly at a normal pace slowly [] [] []</pre>
10. Prior to or during the playing of the movie did you consume any form of intoxicant?
yes no []

PART V
In this section of the questionnaire information regarding your motion picture viewing preferences and habits is requested.
INSTRUCTIONS:
On a scale from one to five, please rate your preference for the following movie categories (a rating of 1 indicates very high regard, a rating of 3 indicates neutral regard, and a rating of 5 indicates very low regard).
Horror
like:::::: dislike

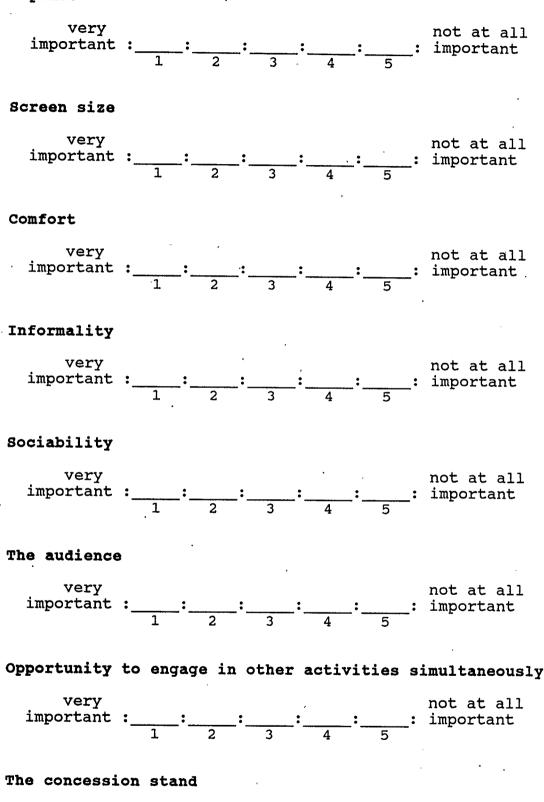
•	7 27= :	_									
	like	:—	: _	2	:3	_ : _	4	- :	5	: disl:	ike
Comedy						١					
	like	:	:_		·	_:_		_ :		: disl:	ike
_		1		2	3		4		5		
Drama	- 4-									**	
	like	:	: _	2	:3	_ :	4	- :	5	disli	lke
Martial	Arts						-				`
	like	:	: _		:	_:		_ :		: disl:	ike
,		_	•	2	3		4		5		
Thrille	_	_									
D	like	:1	:	2	3	_:	4	- :	5	: disli	i.ke
Romance				·							
	like	: 1	: -	2	3	_ :	4	· :	5	disli	lke
Foreign											
	like	:	: _		:	:		<u>:</u> :		: disli	lke
A45		1		2	3		4		5		
Other											
Specify											
INSTRUC	rions:										
Please o	check	the a	appr	opria	ate s	pace	· •			•	
				٠			-		2		
How man	ny mov nths?	ies l	nave	you	seen	at	a t	hea	ter	in the	pa
[] nor	ne										
·[]1 t	to 3										
[] 4 t	: 0 6					-					
	or mor				•						

	have viewed at a theater in the past two months.
•	Does the past two month period reflect your usual rate of movie theater attendance?
	[] yes, this period accurately reflects theater attendance
	[] no, this period overestimates normal theater attendance
	[] no, this period underestimates normal theater attendance
	To what degree does the specific theater building affect your decision to attend a motion picture?
	not at all to a limited extent quite considerably
	Do you typically have a specific motion picture in mind when you reach the decision to go out to the theater?
	yes· no [] []
	Typically, how far in advance of attending do you plan to go out to see a motion picture?
	[] spur-of-the-moment
	[] same day
	[] a day in advance
	[] more than a day in advance

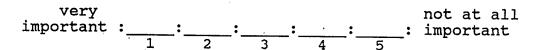
6.	How many motion pictures on video did you view over the past two month period?
	[] none
	[] 1 to 3
	[] 4 to 6
	[] 7 or more
	Please list all the titles you can recall of movies you have viewed on video over the past 2 months.
7.	Does the past two month period reflect your usual rate of viewing movies on video?
	[] yes, this period accurately reflects video viewing
	[] no, this period overestimates normal video viewing
	[] no, this period underestimates normal video viewing
8.	Do you usually have a specific movie in mind when you make the decision to view a video?
	yes no
9.	Typically, how far in advance of viewing do you make the decision to view a movie on video ?
	[] spur-of-the-moment
	[] same day
	[] a day in advance
	[] more than a day in advance

10.	Given a choice, in which setting would you rather view a movie?
. ′	[] in a private residence via a videocassette player
	[] in a motion picture theater
•	***************
	PART VI
	This section of the questionnaire is designed to measure your general priorities in regards to motion picture viewing. The scales address both video and theater viewing.
	On a scale from one to five, please rate how important the following aspects of motion picture viewing are to you (a rating of 1 indicates great importance, a rating of 3 indicates moderate importance, and a rating of 5 indicates no importance).
	Variety of titles to choose from
	very important::: not at all important 1 2 3 4 5
	Control of scheduling (playing time)
	very important::: not at all important: important
	Opportunity to get out of the house
	very important:::: mot at all important: important
-	Capacity to stop, pause, fast-forward, and rewind
	very important:::: not at all important:: important
	<pre>important ::: important Opportunity to get out of the house very</pre>

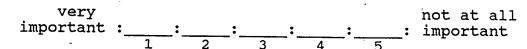
Expense



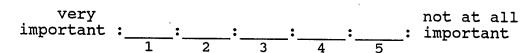
Picture quality



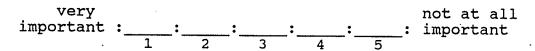
Opportunity to consume foods and beverages not offered in the theaters (i.e. alcohol, pizza)



Sound quality



Privacy



This completes the questionnaire. Thank you for you responses. Please return the questionnaire to room P-547 in the psychology wing of the Biological Sciences building at your earliest opportunity.