

The Demand for Moving Line Analysis to Commercial Space Environment

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Abstract. For modern business environment, distinct guidance of direction and images of environment are the basis of the occurrence and development of business behaviors. As the main carrier of recognition and behaviors, moving line expresses the process of business subjects' and also shows the interaction between business subjects and objects. Thus, customer flow moving line should cater to the need of the consumer group to encourage the customer to buy more. That means it helps customers know exactly where they are and where they want to go, so they can effectively take part in the business behaviors. This article will probe into the customers' demand for moving line from the following four perspectives: psychological needs, environment recognition, behavior guidance and site experience.

The existing problems in the business environment

In the business districts, the analysis can effectively reflect the customers' understanding and recognition about the districts. There are three aspects of problems lying in the modern business environment and behavior organization

The disorientation of the customers caused by disordered moving line

If the business districts focus too much on the switches of spacing and lack the distinct well organized moving line system to lead the customer flow, they may cause the customers lose their direction and disordered behaviors. That means they may not find the place they want to go, or find the stuff they want to buy. This would certainly affect the service efficiency and economic benefits of the business districts.

Disordered environment images caused by vague identification

Images are people's feelings and impressions about the environment. They are not only the reflects of objective facts, but also a series of related thoughts. They affect customers' ability to walk across the environment. If business environment emphasize too much on the overlaying of environment factors and business atmosphere, at the cost of the identification, it will impose negative effects on the environment images.

Homogenization of the business districts caused by lack of themes and features

Nowadays, our country has stepped into the era of experience economy. The consuming process focuses on the experiences of the themes of business environment. If the consuming process is too boring and no other attractive elements attached, it will cause the fatigue of the consumers. And then, the reduction of the shopping interest ensues. According to research, given the similar conditions, consumers tend to take part in the business projects which are more interaction-involved and interesting. A well planned theme and environment experience can increase economic benefits by 30% to 50% of the business districts. However, during the actual visits of the writer, there are some business projects lacking distinct orientation and themes. Some of them just use the slogan of "European style town" or "Jiangnan Style" to conduct the propaganda. They usually don't have a comprehensive understanding of the local landscape and culture. They simply imitate the architecture styles and model those business projects. That leads to lots of featureless business districts. This kind

of projects cannot create personalized business atmosphere and environment experience, thus they are less competitive and lack the power of sustainable development.

The psychological needs of the subjects of the behavior

Nowadays, modern business concerns very much for the needs of people. Those who are more humanized and personalized get one step ahead of others. It is the true reflection to meet the requirement of experience shopping era.

To meet the diversity of the needs

As the consuming ability increases, the consuming behaviors for basic needs gradually turn to higher needs for enjoyments. That means the psychological needs are of equal or even more importance compared to physical needs. The consuming needs tend to be personalized and diverse. People value the enjoyments and pleasure more and more while they are shopping. That asks for a higher standard of comfort of the shopping environment. They hope to conduct a series of complicated psychological actions including appreciation, evaluation, sightseeing, shopping, and so on in the comfortable and beautiful environment to get the satisfaction on both psychological and physical level. In this way, the diverse needs lead to the variety of the business environment, and cause the variety of the business moving line indirectly.

To meet the hierarchy of the needs

The needs of the consumers develop as their own income increase as well as the society develops. According to Maslow' theory, the needs of mankind can be hierarchized into six levels. After they meet the need on the lower level, they will go for the new need on the higher level. Those needs on different levels are related to each other. That requires when designing the business moving line, we should firstly consider the safety issues, then the functions and enjoyments of the moving line to make the business district more experience-friendly and plentiful.

To wake up the potential need

As a research goes, the total needs of customers are formed by 10% of the manifest needs and 90% of the potential needs. When manifest needs are met, potential needs will transform into manifest needs. That is to say that there are intermediate variables between needs and actions. Thus it is the business moving line's duty to lead customers to every inch of the business district by expressing and meeting the potentiality and uncertainty of the needs. In this way, customers will be exposed to products and services as much as possible. That is the basic purpose of the business moving line.

The needs for environment recognition

Environment recognition is a special mechanism in which people and environment deliver information. Modern business environment is formed by moving actions. After recognizing the environment, customers will have scene images inside their head. How these scene images are built needs the help of the adaptability of the customers. During the process of recognition, customers will choose and reorganize what they see. As the medium of subjective recognition, Moving line needs to lead three levels recognition which are direction recognition, order recognition and layout recognition.

To lead direction recognition

A well-organized business environment requires high standard moving line. Customers would like to know exactly where they are and where they want to go at any time. Generally, if there are too many turns and blur route on their way to the target area which are mostly the main reasons of getting lost in the business environment, customers will have the negative emotions like anxiety, pressure, disappointment, etc., and finally leave the business environment empty handed. They will think twice before they make another visit here and that will cause the gain of the business district indirectly.

Therefore, business moving line needs to provide the customers with distinct guidance and implications so that they can find the target products easily. Even for those customers who have no clear target products, clear business moving line is also necessary to make sure that they don't get lost and where they are headed to.

To guide the layout recognition

According to Fork (1985) "*Environment point of view*", generally consumers behaviors have very strong objections and preoccupied preference. They will combine the information from the environment and their own understanding of the environment to present a whole picture of the business district. That comes from the experience in the business environment. To be simple, the consumers can clearly identify their own route to the target products. Clear layout recognition is the deeper needs of business moving line which requires a systematical moving line design. The British scholar Bill Cyril believes that for the consumers, the most important quality of the Moving line is integrity. If it focuses too much on some part or parts, the consumer flow will be ruined. That's a waste of space.

The needs of behavior guidance

Japanese guidance Watanabe defines behaviors in the certain environment as "the consecutive assembles of the directive actions" in the book "*environmental psychology*". He concludes the features of behaviors in the space as: space order (rules and tendency in the space), people flow in space (as in people moving from one certain point to another point), the position of the people in space (orientation of the people in space). The article focuses on the moving line of business environment. It discusses the consumers' moving flow then tries to capture the needs for it. According to a research, the moving actions in the business environment are mainly based on the purpose, choose, random.

To guide moving actions based on purpose

Moving actions based on purpose means the consumers' directional migration in the business environment, including parking, dining and shopping. They have very distinct purposes before they move. They would love to fulfill their purposes quickly and conveniently and then leave in the fastest way. Therefore, customers are mostly concentrated, fast paced and shortest route preferred. If any confusion occurs, they would try to find signs or turn to the staff for help. Customers are not likely influenced by other factors so the corresponding moving line is relatively simple. It's normally formed by starting point and destination expressed as straight line, circle line, U line or L line. All those lines constitute the basic units of moving line design. These behaviors require convenience and reachability and try to avoid the big gathering of the consumers at one certainly or towards one certain direction. However, researchers suggest that this kind of moving is just a basic phase of the consumers actions. The consumers with purposes are not the majority.

To guide moving actions based on random

Moving actions based on random means consumers moving randomly in the business district. They don't have particular to buy or to enjoy. They glance over the windows, stroll around the aisles, just for relaxation. This kind of consumers accounts for a majority of the consumers. They are aimless, slow-paced, and relaxed. Normally they change their routes and directions easily by distractions. They can be influenced by the directions of flow of crowds and density of people. Under the impact of the factors from the environment, they will grow motives for shopping. Different from the previous types of moving actions, the random moving actions have no certain objections. The requirement for moving line is mainly consist of interaction and experience, which means there should be enough attractions in the moving line. As the consuming era comes, both consuming concept and behaviors have changed a lot. More and more people regard the process of consuming as a refreshment and enjoyment. Those mean when designing business moving line, we should base on the characteristics

of the business district and carefully choose the elements of the moving line, to form attractions in the business moving line while try to strike a balance between diversity and convenience at the same time. In this way, the real interaction between environment and actions will be fulfilled.

To consider the consumers' action ability

In business district, the division and length of the moving line should be designed by the consumers' action ability. Customers in different ages, with different sexualities and different consuming levels will demonstrate different moving speed and needs. This objectively reflects the efficiency of the use of the business environment. Normally, when shopping, people stroll while aimlessly look around. The young general walk at the speed of 40 meters per minute to 50 meters per minute. They are very likely to feel fatigued after half an hour or so. As for a relatively long moving line, the first buffer point should be set 400 meters away from the entrance. The elder's speed is normally 30 meters per minute to 40 meters per minute. Since the elder are more prone to tiredness, they usually need a rest after walking for 20 minutes or so. Thus the first buffer point should be set 200 meters away from the entrance or so. Therefore no matter from the point of human stamina, or the point of the usage efficiency of the business infrastructure, neither overly short moving line nor overly long moving line would help consumers enjoy the shopping. The optimal total length of the business moving line is 800 meters while the optimal interval length between two rest point is 300 meters. According to a Japanese business research, the length of business moving line in Tokyo is generally 600 meters to 1200 meters, averagely 880 meters; a buffer point every 300 meters to 400 meters.

The needs for site experience

As the experience economy goes more and more popular, experience is now welcomed by more and more people. This kind of experience consuming tries to create special and enjoyable feelings by providing sense organ experience and psychological recognition. As an American research suggests that customers would linger 4 hours in an abundant experience and enjoyable environment while they are very likely to stay for 60 minutes to 90 minutes in a business district without such conditions. It means experience has become a very important strategy in the marketing. The pure shopping is no longer just for shopping provided the joyful experience. It transforms into meaningful activity and experience. As marketing expert Ted Lester pointed out: "What customers buy is not just products themselves. It is the solution to their problems that they buy." Therefore, in a business district, moving line should cooperate with different experience factors. Only if by enhancing the experience and enjoyment of the consuming itself can a business district defend the impact of globalization and standardization.

To create a scene atmosphere

Scene is the primal medium of the image recognition for consumers. By using the moving line as the medium to deliver the business scene can not only strengthen the continuity and trends of the scene system, but also create a feeling that every a few steps they take the scene changes as well. That insures that when the view angles switch from place to place, they can still feel the good sense of order. Meanwhile, from the point of environmental psychology, this kind of coordination of action and vision support for the marching forward of the customer flow. Also this makes the process of the consuming more enjoyable and help to alleviate the feelings of fatigue

To inherit the cultures

Nowadays city residents have upgraded their consuming needs, which requires more about the enterprise's cultural connotation objectively. Shopping has been transformed from a pure economic behavior into a cultural behavior. Thus business district should express a special cultural connotation. The designer should dig into the cultural features and research most outstanding, representative and shocking existence in the long history. After collect all these cultural signs, designers should organize

them by moving line vividly trying to focus on consecutive transformation and development of scenes to create flowing environment experience for the consumers. This will intensify the recognition to the site and help build a bonding connection between the traditional culture and new environment.

After being renovated, the Potsdamer Platz attracts more the two million tourists. Its identification has grown far beyond merely business and entertainment center to become the symbol of the spirit of the city Berlin. The whole district contains abundant cultural facilities and various theme activities, making the economic and cultural support for each other. The designer integrate all kinds of cultural elements together by using reasonable moving line to open up not only cultural site-seeing but also create a special atmosphere for the Berlin Movie festival.

To deliver the denotation of sites

Fixed environment & facilities and fixed action modes constitute site. Modern business district bears abundant city functions and diverse action modes. It can also be defined as a systematic consuming & entertainment space. From the view of site theory, a business district organization is basically coordinating the structure of the site and enhances the connection between one another. Moving line is the guidance system. It emphasizes the needs of people by guiding subjects' behaviors. It also combines social factors, cultural factors and sense factors together to harmonize the multi-functions in the business district. In this way, the different districts are separate from one another while connected to on another. In a way, the eventual purpose of designing moving line is to make consumers interact with the site and stimulate their desire to consume.

Citadella is the new city center of Kawasaki. The business district combines the functions of shopping, dining, movie-watch and night clubs to create a whole new metropolitan experience for both local residents and tourists. The designing master Ched start with the designing concept that a city is more a show stage which people demonstrate themselves than merely a container where people live in. So the development of the city should focus more on the key factors of the people to create a harmonized entertainment and relaxation site.

Under the dimension of space organization and recognition, environment factors spread logical images and highlight the theme by moving line. It has four levels of needs for the guidance of moving line, which is to take moving line as guiding system to fulfill consumers psychological needs, to guide distinct environment recognition, to organize consumers' moving flow and to cooperate with the site experience. On the basis of that, moving line designing should follow the principles of clear guidance, identifiable images and distinct themes.

The Principles of Distinct Guidance in Moving Line Designing

Principles of distinct guidance

Guidance means environment has influence over consumers' direction choices. A well guided direction can provide a clear knowledge of the route the want to take. This can make customers feel comfortable and pass by as more shops as possible to stimulate potential business transactions so that business district can make as more profit as possible. In modern business environment, the guidance of the moving line should include the following functions: firstly, to insure a correct direction and proper order. Direction of moving line helps customers get an accurate position orientation while order of moving line is the guarantee of the correct direction. This will provide a most convenient route and stable sense of direction. Secondly, in a business district which contains multi moving line, it is important to keep the whole layout simple and clear as well as the primary and secondary moving line to make a one-piece impression for the consumers and position functional units.

Principles of identifiable images

Images are assembles of feelings of environment and impressions. They are not only just an objective reflection of the facts, but also related modes formed inside people's mind. They affect

people's ability to walk across different environment. A good moving line system helps consumers more easily form images in the environment. As environment behavior experts Pasini (1984) points out :” One man can only recognize his own position to achieve by the cognition of images.” There for moving line is the medium of images. It should consider firstly the identification of the customer moving in the environment. To start with the creation of site images, to take the vision and touch of consumers, to conduct continual guidance and to form a one-piece image by intensify route, intersection, and boundary and so on.

The principle of highlighted theme

Moving line guides the paces of consumers. People follow its lead. It decides what people see first and what people see second. It puts people into a clear sequences. A successful moving line is a series of threads of stories. It makes the consumers fulfill their needs while experience featured atmosphere and layout. It expresses theme and core idea. A good moving line can both enhance district's economic profit and the enjoyment and aesthetic value of business district. It is the basis of the modern moving line designing in this era experience. Therefore, designers should organize the moving line by making customers switch vision and environment feeling to stimulate consumers' interest and curiosity to the next scene. In that way, consumers feel like they have a different view every a few steps they take and it should pay attribution to the guidance, activation, and decoration functions of moving line.

Summary

The article starts with current problems in business districts. Then it analyzes different needs of the business district organization. To use moving line as a tool to guide customers' flow should meet four needs as follows: psychological needs, environment recognition, behavior guidance and site experience. On the basis of this, the designing of moving line should follow the principles of distinct guidance, identifiable images and highlighted themes. It is crucial for the operation of the whole business district to design a proper moving line system. It does great good not only to provide good shopping experience for the customers but also increase economic profit for enterprises.

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