# MAKE YOURSELF AS COMFORTABLE AS POSSIBLE: A PROXEMICS APPROACH FOR PASSENGER COMFORT OF ONLINE MOTORCYCLE RIDE-HAILING (*OJOL*)

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**Abstract** Motorcycle ride-hailing service (*Ojek Online* also known as *Ojol*) that using phone / mobile application as the public transport of two-wheeled taxi, currently a popular public transport used by the general public, *Ojol* Services in addi-tion to having some advantages such as the speed of road access in urban areas, high cruising range, and economical, but on the other hand there are things that are basically out of the ordinary situation, that will affect to the comfort of passengers, both from the psychological and physical side.

The phenomenon of distance and sitting position between the driver and passengers that are very close was the attention of the author, that condition becomes one of the research questions to know what factors which makes passengers feel the condition is still reasonable although the distance privacy and the position has entered into an intimate distance and how to make that situation more comfortable by develop some product design.

In this study data collection is planned using literature study method, observation, interview and questionnaire so as to get data such as complaints from users psychologically or the perception of passengers by using proxemics approach related to passenger seating position and other findings that can be considered in improving the comfortable of *Ojol* service users.

The result, distance and sitting position will create a condition that is uncomfortable for the passengers, and tend to try to create space or physical distance apart, psychology suggestions in various ways, or positions in order to get a little comfort, there is a consensus about the prevalence where that "out of the ordinary" is still considered reasonable, temporary, always in a 'supervised' state by the public, professionalism expectation, and various other psychology suggestions.

**Keywords**: comfort, motorcycle, ojek online, passenger, perception, product design, proxemics

#### 1. Introduction

Ojek (motorcycle taxi) have become an integral part of our public transport system, although there have been many types of formal public land transportation serving the community but it cannot be denied that under certain conditions such as jam conditions, hasty conditions, or lack of formal public transport reaching the area the settlement makes Ojek as one of the most reliable freight options, especially with

the development of several online *Ojek* booking applications that can make it easier for customers to order services from anywhere and anytime at a measurable and transparent rate, this transportation get positive responses from both potential drivers and consumers (Hendrastomo, 2016).

Ojek Services in addition to having several advantages such as the speed of access roads in urban areas, high cruising range and economical, but on the other hand there are things that are basically out of the ordinary that will at

least affect the comfort of passengers both in terms of psychology and physical, in fact we know that the driver *Ojek* is usually a person we do not know before, we do not know how the ability of the driver in using the motor, how to clean the driver's body, helmet cleanliness provided for passengers, especially in this matter of particular concern to the distance and position sitting, because usually passengers sitting with a position facing forward in line with driver in front of very close even the possibility of touch, distance and position is different if we compare with other public transportation like Pedi cab or *Angkot*.

The subject matter which is a barometer of the extent to which the user's perception of the phenomenon of distance and the seating position is very close between the driver and passengers through proxemics approach? What recommendations and suggestions can be applied in improving passenger comfort without sacrificing safety aspects and also fulfilling aspects of ease, efficiency and economics? Limitations in this study include research objects are *Ojek* that

operate in Bandung and surrounding areas, the sample is a customer who does not know personally with the driver.

With the size of the fulfilment of the need for transportation facilities that have specific objectives, with all the advantages possessed, the service *Ojek* should be developed with more attention to aspects of comfort and security. The current condition of most motorcycle taxis are informal paratransit, so the management aspect tends to be ignored, especially in terms of user convenience, it is hoped that the review using proxemics method can find data about what kind of psychological user complaints in using *Ojek* service, so it can be used to find solution to a better level of comfort and still have good security.

### 2. Theoretical Background

#### 2.1. Definition of Proxemics

Proxemics is a study that examines human perceptions of space (personal and social), the way humans use space, and the influence of space in communication. (Edward T. Hall in Mulyana, 2005). Distance / Rule of space summarized by the influence of the work of Anthropologist Edward T. Hall in his book The Hidden Dimension (1990) suggests that in the interaction there are certain rules in terms of space usage. Distance or space has functions:

- Safety: When there is a distance between us and others, we will feel secure because we believe that person will not attack us with surprises.
- Communication: when people are close to us. we will easily communicate with them
- Affection: When people are close to us, we can interact with each other
- 4. Threat: or threats, it can be done otherwise, we can consider treating others by breaking their space.

#### 2.2. Distribution of distance zones in Proxemics

The tendency to use space arises because of territorial impulse, the use of space is closely related to the ability to mingle with others and the determination of intimacy between the self with others. Based on his observations in North America, Hall (1990) determined the division of distance zones where humans move into 4 zones:

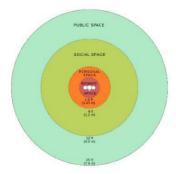


Figure 1. Zone of proxemics

1. An intimate distance of 0-18 inches (0-45 cm). This distance is commonly used with intimate people. At this distance, the presence of another person is phys-

- ically disturbing. In this distance the eyes are distorted and the voices are heard as a whisper, moaning, or snoring. At this distance also two people can feel the heat and body odor and can touch.
- 2. Personal Distance (Personal) 18 inch-4 feet (± 0.5m-1,5m) 18 inches is the outermost distance and the intimate and initial distance from personal dis-tance. At this distance we lose the feeling of heat and body odor of the partner except when using a strong fragrance smells. Eye view begins to look focused and the sounds issued begin to have a verbal meaning. Although the terms included in this type are typical, yet one can still hold, or encourage their partner. This distance is the distance of interaction from a good friend, is also the most appropriate distance for people who discuss personal issues.
- 3. Social Distance 4 10 feet (1.5m-3m). It is also called a psychological distance, where one begins to feel anxious when another person enters the boundary of his territory (an impersonal transaction zone). In this distance we can really see and hear clearly. Our eyes can focus on the overall face of the person faced when the distance is more and 8 feet.
- 4. Public spacing 10 feet unlimited (± 3m). Once a person is at this distance we can understand the nuances of the meaning of the face or the intonation of the voice of others. Then we can look at the body of others. This is the distance of lectures, mass meetings, interactions with powerful figures.

With this theory, we can see that Ojek passengers are in a state of being 'alone' in an intimate distance for a relatively long time with an unidentified person. Under these conditions passengers will have various psychological discomforts.

#### 3. Result and Discussion

#### 3.1. Perceptions of comfort based on distance zones

The collection of processed data consisted of 40 respondents using questionnaires technique with 12 main questions which are fractions of 4 core questions which aims to: Know the psychological comfort perception of physical condition if they are together with unknown persons with very close spacing; Intensity of time doing activities with intimate distance; Variations of body position and adaptation activities that affect the comfort level when on motorbike; Gathers input on product development expectations for in-creased convenience.

With the development of online applications in the delivery of *Ojek* services, service users will more often get the *Ojek* drivers differently or randomly, unlike ordering services on *Ojek* that may meet greater possibility, the application system, some respondents do not know ready for the driver which they ordered, as many as 90% of respondents claimed not to know before with the driver, and only 10% who already know each other.

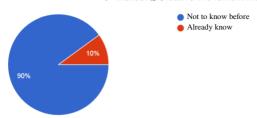


Figure 2. Comfort with others

In general, respondents agreed that being close to an intimate distance (0-45cm) with other people they did not know tended to feel disturbed, this was in line with Edward T. Hall's theory which said that physical intimate space was disturbing to others, especially with the other unknown people, As many as 80% of respondents agreed that differences between others who agreed with them would give a negative impression, feel annoyed or uncomfortable, and only 20% were accepted who felt quite comfortable.

Regarding their position as ojek passengers, they are conditioned to sit together side by side in a relatively long time on a motorcycle with other people they do not know, as many as 63, 2% of respondents claimed to be uncomfortable, and as many as 36.8% who felt quite comfortable.

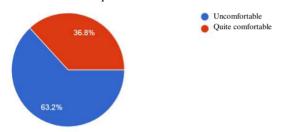


Figure 3. Comfort with others based on time

With the distance and sitting position they used to do on a motorcycle taxi with a driver that they do not know there is an "announcement" that was created to be said to be reasonable / unobtrusive even though basically they are less comfortable psychologically, the most number of 45, 8% is due they still feel able to condition themselves or adapt to create a distance that can provide better privacy on a motorcycle taxi although not significant, as many as 29.2% assume that they have no other choice and they convince themselves that the driver has and will be professional because that is his job with no other mode, and the rest with 12.5% each said that with sitting position not face to face or not face to face and be seen by many people or transparency in the activities then tend not to feel disturbed because there is some kind of outside control if at any time the driver behave in violation of passenger privacy.

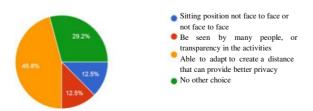


Figure 4. Declaring comfort with others

#### 3.2. Intensity of activities within intimate distance

The length of time for motorcycle taxi service users is generally less than 30 minutes of travel or the range of distance of 2-8 km with a number of respondents 52.4%, and the number of trips between 30-60 minutes of travel or the range of distance of 8-16 km with the amount which is almost the same that is as much as 47.6%, with such travel time it can be said that they spend quite a lot of time on a side-by-side trip together with strangers who are very close to the position and distance of sitting, whereas basically they tend to feel dis-turbed by the situation.

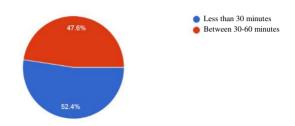


Figure 5. Travel time

The routine of respondents in using motorcycle taxi services is at least once a month as much as 81.8%, those who use motorcycle taxi services at least once a week are at 13.7%, and those who use every day are only 4.5%, seeing the data there is a possibility they are not too disturbed in using motorcycle taxi services because these activities are generally not routine activities or primary needs, but for activities that are in the incidental category / at any time so it is not a big problem if at any time they have to travel together with other people who are not known as the distance sitting very close together.

# 3.3. Variations in body position and adaptive activities that affect the level of comfort

Most of the passengers used the same sitting attitude as the driver, namely the body and legs facing forward (straddle) as much as 96.3% and only 3.7% who used the sitting position facing to the side.

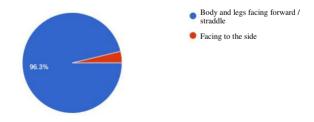


Figure 6. Sitting posture

When driving with a stable speed, not in a traffic jam or no obstacles most passengers feel more comfortable if the position of the hands rests on the knees with a percentage of 51.9%, another position is to not rely on or hold on to anything from the motorbike or from the body part of the driver with a percentage of 33.3%, respondents who chose to hold the handgrip position were 11.1%, and only 3.7% chose to hold on to the body of the driver in front of him.

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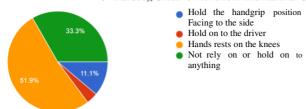


Figure 7. Hand position when the speed is stable

When driving at unstable speeds, such as traffic jams or stop-and-go, most passengers feel more comfortable if the position of the hand holding on the hand-grip that is right and left side of the passenger seat with a percentage of 44.4% is the same with the position of the hand holding on the hand-grip which is behind the passenger seat, and only 11,1% who choose to hold the position of the driver's body such as the waist or the jacket of the driver in front of him.

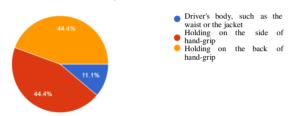


Figure 8. Hand position when the speed is unstable

#### 4. Conclusion

Sitting together or sitting together in a limited means of sitting with people we do not know especially in a very close position or in intimate distance will certainly make us awkward even uncomfortable and uncomfortable, it is common if in normal conditions. However, if we are faced with conditions that are 'forced' as if we use the services of Ojek, then such things will be conditioned in various ways such as psychologically using suggestion as the creation of 'pseudo space' by assuming that these conditions are normal, are temporary, always in a state of 'being watched' by the public, the suggestion of the driver is professional, there is a greater importance than the inconvenience, and various other suggestions.

Physically viewed from the aspect of driving safety, the ideal position for passengers is in straddle or straddling positions such as the driver's sitting position, but this position forces the passenger not only to potentially physically touch but also enter into the intersection blocking position because the position of the foot or hand has entered or intersected into the driver's area.

In the intersection condition, even though ignoring the gender aspect, it will create an uncomfortable condition for the passenger, so the passenger tends to try to create space or physical distance other than suggestion in various ways or positions in order to get a little comfort.

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