

Motive and Perception as Distinguishing Factors of the use of Analog Camera in the Digital Area

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Abstract— This research is aimed to identify the motives of analog camera users in using the analog camera in the midst of current digital era. It is also conducted to understand the society's perception and opinion on the existence of analog camera in current digital era. The theory employed in this research is "Uses and Gratification" by Elihu Katz and Jay G. Blumler. This theory corroborates that generally the society uses the media for specific motives. Perception is predicated on three things; selection, organization, and interpretation. Selection consists of sensation and attention; meanwhile organization is heavily linked to interpretation which is defined as "attaching a stimulus with other stimuli to derive the whole meaning". This research uses a positivist or classical paradigm with a quantitative approach and a descriptive research form. The data collected for this research was taken from a survey with dozens of questions done to 117 people, consisting of analog camera users and the cyber society. The data analysis used here is discriminant analysis. The result of the research shows that there is a motive of using the analog camera predicated by a desire to experience using analog camera and a desire to gain prestige; the accuracy of using this discriminant model is 57,1%. Meanwhile from the perception argument, the use of analog camera is predicated by "a perception to have unique analog camera images", "a perception to look skilful in photography" and "a perception to cultivate the skills in photography", the accuracy of this prediction achieves 47,1%.

Keywords— analog camera, digital culture, discriminant analysis, perspective.

I. INTRODUCTION

As we move into the digital era, the rise of technology which eases the human life has subsequently created significant change in the social system. Rogers [1] describes that technology is a design of instrumental activity, aimed to reduce the uncertainty resulted from the consequence of causal effect as well to achieve the desired goal. Technology generally can be a hardware and software.

Digitalization, for Rogers (Rogers, 2001), is a product of innovation, meanwhile innovation is described as an idea, thought, or concept deliberately accepted as a new thing for the society or other units receiving it. In other words, digitalization is one of the products of diffusion of innovations model. Everett M. Rogers defines diffusion as a process which an innovation is deliberately communicated through a channel over a period of time within the members of a social system. Diffusion is a particular form of communication, highly related to spreading new ideas. Within the message, there is a novelty which becomes an exclusive characteristic for diffusion which carries uncertainty. The condition of social and

technological change within the society has created needs which subsequently substitute the old methods with the new ones. [2][3]

Digitalization has also penetrated into the world of camera. Camera is an instrument to capture moments or events, as well as a medium functioned to convey a message through an image. Today, the mirrorless camera is probably the newest innovation from the previously existing DSLR technology. Mirrorless is essentially a DSLR camera, removed in its mirror box. Without the mirror box, created to deflect the light from the lens onto the optical viewfinder, the size of mirrorless is significantly reduced compared to DSLR, but it still maintains its image recording quality further with its lens can be easily substituted.

(<https://tekno.kompas.com/read/2016/09/13/10470087/apa.itu.kamera.mirrorless.bedanya.dengan.dslr>. Accessed in March 27, 2018)

Digital camera supports taking as many pictures according to the size of camera storage, it also enables us to easily delete some pictures taken, either mistaken or better discarded pictures. Different to analog camera, the

latter is different in its process of capturing the image, storing with relatively smaller size, but also it is incapable of instantly deleting the taken pictures and it requires longer time to print its pictures compared to mirrorless camera.

This phenomenon can be observed from the high number of visitors of Lowlight Bazaar, an analog photography bazaar. That bazaar has been held twice since 2010. Renaldy Fernando, the founder of Jellyplayground, an analog camera enthusiasts forum, states that the event in 2017 was the eleventh occasion and it managed to attract 1700 visitors. The growth of analog camera photography can also be observed through the search on Carousell phone marketplace. The president and Co-founder of Carousell, Marcus Tan, states that there are 38000 listings in photography category and analog camera steps us to be the most searched item. (<https://www.antaranews.com/berita/658414/kamera-analog-kembali-dicari-kenapa>. Accessed on March 27, 2018)

Besides, many analog camera enthusiast communities have emerged. For instance, Jellyplayground, Komunitas Kamera Analog Jogja, Indonesian Analog Photography Enthusiast Community (IdFilm), Lomonesia Indonesia, and many others. Those community members are spread out in different areas in Indonesia. They manage to share knowledge and experience in using and studying the analog camera. They also find shared objects to their photo, upload it on their own community page on social media, as well as publish it to the vast society or any other analog camera enthusiasts outside their own community.

Based on Kompas Tekno observation on Wednesday, August 2, 2017, it is estimated that no less than 150,000 pictures with hashtag #indo35mm are spread out on Instagram. What does the hashtag #35mm signify? 35mm refers to the most common type used in analog camera. The colouring produced in the analog camera pictures is essentially quite similar to the presets existed in some editing apps such as VSCO, SnapSeed, etc. Mainstream picture effects from analog camera such as flare or burn are also provided in the editing apps of digital photo. (<https://tekno.kompas.com/read/2017/08/02/14282837/kam-era-roll-film-ngetren-lagi-foto-35mm-ramai-di-instagram-tanah-air>. Accessed on March 27, 2018)

This somehow indicates that the analog camera does not necessarily collapse in the current digital era. The analog camera still attracts many enthusiasts. The society actively utilizes media in purpose of fulfilling their necessity. This means that the society uses media to gain gratification for their needs.

This phenomenon is thought-provoking to be researched and studied for what are the laymen and analog or digital camera photographers' perception and opinion on this matter, and what are their reasons in using analog camera as a medium of conveying message through an picture in this digital era. Having elaborated this background, the questions posed in this research are: "How far do perception and motive become distinguishing factors to the use of analog camera in the digital era?" The purpose of this research is as follows: (1) To know the motive of the analog camera users in reviving the use of analog camera in recent digital era; (2) To know the perception, opinion, and perspective of the cyber society on the existence of analog camera in today's digital era.

II. LITERATURE REVIEW

Everret M. Rogers explains that technological development is, in essence, in a line with establishment of communication, the diffusion of innovation. For Rogers, diffusion is a process at which an innovation is communicated to several channels within particular period. Diffusion is a specific form of communication, related to the spread of innovation as a new idea, on this matter, it is the development of analog to digital camera. Rogers also propounds 5 categories of adopters, they are: (1) Innovator (2) Early Adopters (3) Early Majority (4) Late Majority (5) Laggards. [3][1].

In this research, some individuals are known to keep using analog camera in this digital era. The society is actively using media to fulfil their needs. On this matter, the study focuses on the uses of media as to gain gratification for the need of individual.

Some researches using Uses and Gratification theory have been done many times, for instance a study on the spread of pictures through facebook [4], [5], news publishing in the old and new medias [6], using e-book [7], the use of weChat in China [8], study by e-learning [9], mobile communication [10], [11], [12], [13]. This theory, however, employs Uses and Gratification theory in the use of analog camera.

Katz et al. and Dennis McQuail describe the logic which predicates the Uses and Gratification research. [14]. Katz, Gurevitch, dan Haas see that the mass media is an instrument utilized by the individual to connect to the others. This need has actually been classified into 5 categories: (1) Cognitive Need (2) Affective Need (3) Integrative Personal Need (4) Integrative Social Need (5) Tension Release Need.

The gratification is built from hopes. In other sides,

hope affects perception. Perception [15] [16] is an internal process which enables us to choose, organize, and interpret the stimuli given from our surroundings, and that process essentially affects us. Perception includes sensing through our possessed senses, attention, and interpretation. Sensation refers to the message carried to the brain through sight, hearing, touching, smelling, and tasting.

Perception consists of three activities: selection, organization, and interpretation. Selection actually covers sensation and attention, while organization is predicated on interpretation which can be defined as “attaching the stimulus with other stimuli to derive the whole meaning”. These three perception stages (sensation, attention, and interpretation or selection, organization, and interpretation) cannot be strictly distinguished as to when one stage ends and the next stage starts. [17], [18], [19].

Analog camera is a type of camera with its capturing technique using celluloid film, at which the film has three basic elements, the optic, chemical, and mechanic element. Optic element consists of lens and its variety, meanwhile the chemical element is, in essence, the celluloid film. The mechanic element is the camera body and any other components in it. Analog camera is often called as “film camera” because of the use of film as its main storage compared to memory card in digital camera. (<http://scdc.binus.ac.id/klifonara/2017/06/kelebihan-kamera-analog/>. Accessed in March 27, 2018)

While camera advances in evolution, it actually gets smaller and lighter therefore enabling us to carry it more easily. Though the instrument has probably changed in size and shape, for hundreds of years, the principle of film camera in recording image is consistently the same, to capture the permanent image assisted by the chemical components reacting to the presence of the light. (<https://tekno.kompas.com/read/2017/08/05/10465657/berkenalan-dengan-kamera-film-yang-kembali-digandrungi-di-indonesia?page=all>. Accessed in April 13, 2018)

Film format that is commonly used is film 135. It got popularized by a German camera factory, Leica, in the beginning of 20th century because of its small size and therefore allowing a smaller size of camera which used it then. The type of camera which uses film 135 can also be distinguished into different categories, such as rangefinder, compact camera, SLR (single lens reflect), and polaroid camera.

The research on analog camera has been various, for instance in studying the quality, superiority, and the shortcomings of analog camera [20], image quality [21], product quality and brand image of analog camera [22], quality of lighting [23], and the produced picture precision

[24].

III. RESEARCH METHOD

This research employs descriptive quantitative research with survey method and positivist paradigm. The quantitative approach is deliberately chosen as the object of this research is a process or activity or the act of some people, here it is the photography community which uses analog camera as the instrument. This research is an attempt to analyse the opinion and perception of cyber society as the analog camera is revived in this digital era. The survey method also enables us to generalize the certain social phenomenon or variable to greater social phenomenon or social variable. (Bungin, 2005)

The population in this research is some people consisting of cyber society who use analog camera and those do not. The sample of this research consists of 2 parts, they are: (1) Member of analog camera community in Jakarta, Kelas Bina Pagi Analog, consisting of 20 people (2) Cyber society consisting of 97 people.

The sampling technique used here is nonprobability sampling, respectively the purposive sampling. The researcher therefore analysed from two sides respectively the analog camera user and the cyber society who observed the trend of analog camera usage in this digital era. Thus, there are 117 samples in total within this research. The collection data technique was done by giving the questionnaires to the respondents.

This research also employs Univariate analysis. Univariate analysis is an analysis on one variable. This type of analysis is deliberately selected for descriptive research. This research uses descriptive statistics. Descriptive statistics is employed as to describe an event, behaviour or any other particular objects (Bungin, 2005)

Besides, to purposefully know the difference of analog camera users, this research uses discriminant analysis technique, a statistical technique employed for dependent relation (a relation among variables at which responding and explanatory variables can be distinguished). This discriminant analysis is aimed to classify an individual or observation into mutually exclusive and exhaustive category based on several explanatory variables. [25] http://daps.bps.go.id/file_artikel/65/ANALISIS%20DISKRIMINAN.pdf Accessed in December 31, 2019).

IV. RESULT AND DISCUSSION

The respondents, 117 people in total, consist of 51 females and 66 males. Most are university students, respectively 62

people with an average of age ranged from 16 to 25 years old. The rest are 48 people with an average of age ranged from 26 to 35 years, meanwhile only 7 people ranged from 36-45 years old. The respondents are private employees with 52 people, 30 from university students, 12 people from both freelancers and unemployed, government officers with 11 people, 8 people from entrepreneurs, and 4 participants from photographers.

The vast majority of respondents (86,32%) have photography as their hobby and merely 16 people who do not share the hobby. Those who have this hobby, 28% of them are analog camera users, 31% of them are digital camera users, and 27% are the phone camera users. Observing the frequency of doing the photography, many respondents (53,85%) still allocate their time to do photography. Based on the camera type operated, those using phone camera are still the majority (39,32%). Meanwhile, the least are the analog camera users (28,21%).

4.1. Motive

A distinguishing analysis on analog camera users was done based on the respondents' answer to "motive and perception" variable, with the highest mean (4,1 and 4,0) is on the motive of "a desire to experience analog camera" and "a desire of unique analog camera images" within the analog camera users; meanwhile, the mean is 3,8 on the digital camera users. However, on the phone camera users, the highest mean was scored on the motive of "a desire to remove boredom" (3,28) and "a desire of unique analog camera images" (3,27).

Only one variable has sig > 0,05, which is "desire to remove boredom". The rest 8 variables present a difference in the use of different camera type. To test the similarity of varians, here it is used Box's M test with a criterion of judgment: if significance level (α) > 0,05 therefore H_0 is approved; conversely, if significance level (α) < 0,05 consequently H_0 is rejected.

The examined hypotheses in this instance are:

H_0 = Varians of two groups of identical or homogenous data

H_1 = Varians of two groups of non-identical or heterogeneous data

The results of Box's M test are the followings:

Table 1 Test Results Box's M

Test Results		
Box's M		216,629
F	Approx.	2,136
	df1	90
	df2	33018,811
	Sig.	,000
Tests null hypothesis of equal population covariance matrices.		

As the significance level of the Box's M statistical test is = 0,000 (< 0,05) therefore H_0 is rejected. Thus, the variants of the data group are non-identical/ heterogeneous. On the discriminant analysis stage, stepwise method is therefore used as follows:

Table 2 Motive Item on Discriminant Analysis

Variables Entered/Removed^{a,b,c,d}

Step	Entered	Min. D Squared					
		Statistic	Between Groups	Exact F			
				Statistic	df1	df2	Sig.
1	Desire to experience analog camera	.223	Analog Camera and Digital Camera	4,044	1	116,000	.047
2	Desire to gain prestige	.399	Analog Camera and Digital Camera	3,589	2	115,000	.051

At each step, the variable that maximizes the Mahalanobis distance between the two closest groups is entered.

- Maximum number of steps is 18.
- Minimum partial F to enter is 3.84.
- Maximum partial F to remove is 2.71.
- F level, tolerance, or VIN insufficient for further computation

The test above shows that there are two stages which result two motives of differentiating the analog camera users and digital camera. They are "desire_to_experience_analog" and "desire_to_gain_prestige". Both have a significant value of Exact F (< 0,05).

Table 3 Wilks' Lambda and F Value Test

Step	Number of Variables	Lambda	df1	df2	df3	Exact F			
						Statistic	df1	df2	Sig.
1	1	.703	1	2	116	24,499	2	116,000	.000
2	2	.634	2	2	116	14,742	4	230,000	.000

The table shows the changing of Lambda value and F Value Test in each stage. The significance value < 0,05 reach at second step. Therefore, both motives are all considered in discriminant model. The significance value for the two motives are 0,000: at first step F value = 24,499 and at the second step F value 14,742. As the

significance value is 0,000 (< 0,05) therefore both motives in each category actually have significant difference.

Table 5 The Eigenvalues and Canonical Correlation

Function	Eigenvalue	% of Variance	Cumulative %	Canonical Correlation
1	,575 ^a	99,6	99,6	,604
2	,002 ^a	,4	100,0	,048

a. First 2 canonical discriminant functions were used in the analysis.

As shown above, Function 1 has Eigenvalues = 0,575 for two motives within that discriminant function. Function 1 may explain the 99,6% variants in the use of camera. The canonical correlation value shows the relation of discriminant value to the group. The canonical correlation value is 0,604, which means 36,48% variants of the independent variable (group) can be explained from the resulted discriminant model. The value 0,604 describes that its correlation is quite high.

Table 6 Wilks' Lambda value for the discriminant function test

Test of Function(s)	Wilks' Lambda	Chi-square	df	Sig.
1 through 2	,634	52,722	4	,000
2	,998	,271	1	,602

Based on the Wilks' Lambda table, it is understood if the employed factors are factor 1 up to 2 (both existing factors) then Chi Square value is 52,722 and its significance value is 0,000. It indicates a significant difference among the three groups of camera users. However, if only 2 factors here, the difference becomes insignificant (Chi Square = 0,271 and Sig. < 0,05).

Table 7 Standardized Canonical Discriminant Function Coefficients

	Function	
	1	2
Desire to experience analog camera	,927	,399
Desire to gain prestige	-,521	,865

From the table above, it is known that function 1 is the motive of "desire to get a different experience in using analog camera" with a correlation score = 0,927, meanwhile function 2 is "desire to gain prestige" with a correlation score = 0,865.

Table 8 Matrix Structure of Discriminant Function

MOTIVE ITEMS	Function	
	1	2
Desire to experience analog camera	,857*	,516
Desire to have unique analog images	,602*	,441
Desire to train analog ability ^b	,571*	,410
Desire to cultivate creativity ^b	,551*	,421
Desire to recognize photographer references ^b	,364*	,327
Desire to gain prestige	-,396	,918*
Desire to cultivate skills ^b	,206	,521*
Desire to add friends	,148	,327*
Desire to remove boredom ^b	,051	,291*
Pooled within-groups correlations between discriminating variables and standardized canonical discriminant functions		
Variables ordered by absolute size of correlation within function.		
*. Largest absolute correlation between each variable and any discriminant function		
^b . This variable not used in the analysis.		

The coefficient for the discriminant function is presented in the following table.

Table 9. Canonical Discriminant Function Coefficients

	Function	
	1	2
Desire to experience analog	1,590	,685
Desire to gain prestige	-,500	,830
(Constant)	-4,820	-4,371
Unstandardized coefficients		

On the next table, the discriminant function divides the groups of the camera users based on its factor value.

Table 10. Functions at Group Centroids

Camera Type	Function	
	1	2
Analog Camera	,894	-,050
Digital Camera	,273	,066
Phone Camera	-,892	-,020
Unstandardized canonical discriminant functions evaluated at group means		

The analog camera belongs to factor 1 (0,894), as well as digital and phone camera. Therefore, the use of analog camera by the phone camera users is predicated more by a motive of “desire to get a different experience in using analog cameras”. The difference between phone camera users (having a negative sign -0.892) and analog camera users is at the level of desire: analog camera users have more desires than phone camera users.

Table 11. Classification Results

Classification Results ^{a,c}						
	Camera Type	Predicted Group Membership			Total	
		Analog Camera	Digital Camera	Phone Camera		
Original	Count	Analog Camera	21	12	1	34
		Digital Camera	12	22	5	39
		Phone Camera	2	19	25	46
	%	Analog Camera	61,8	35,3	2,9	100,0
		Digital Camera	30,8	56,4	12,8	100,0
		Phone Camera	4,3	41,3	54,3	100,0
Cross-validated ^b	Count	Analog Camera	21	12	1	34
		Digital Camera	12	22	5	39
		Phone Camera	2	19	25	46
	%	Analog Camera	61,8	35,3	2,9	100,0
		Digital Camera	30,8	56,4	12,8	100,0
		Phone Camera	4,3	41,3	54,3	100,0

- a. 57,1% of original grouped cases correctly classified.
- b. Cross validation is done only for those cases in the analysis. In cross validation, each case is classified by the functions derived from all cases other than that case.
- c. 57,1% of cross-validated grouped cases correctly classified.

The Original section shows that those who were, in the beginning, the analog camera users (34), from the discriminant model, 21 respondents keep using analog camera (61,8%). The digital camera users who keep using the digital camera are 56,4%, and the phone camera users keep using the phone camera are 41,3%. The table above displays the accuracy of this discriminant model up to 57,1%. If it is generally concluded based on the motive, the use of analog camera is predicated by the motives of a desire to experience the analog camera and a desire to gain prestige.

4.2. Perception

The highest mean value (3,82) is on the perception of “to have unique analog camera images” among the analog camera users; while within the digital camera users, the highest mean value is 3,63 on the perception “to have different experience”. Likewise, within the phone camera users, the highest mean value is on the perception “to have different experience” (3,19). In the following, the test of equality of group means is conducted as follows.

Table 12 Tests of Equality of Group Means

	Wilks' Lambda	F	df1	df2	Sig.
1. Perception to have unique analog camera images	0,925	4,688	2	116	0,011
2. Perception to merely cultivate photography skills	0,932	4,215	2	116	0,017
3. Perception to have different experience	0,937	3,882	2	116	0,023
4. Perception to have photography references on analog camera	0,939	3,765	2	116	0,026
5. Perception to look prestigious	0,946	3,311	2	116	0,04
6. Perception to look skillful in photography	0,95	3,057	2	116	0,051
7. Perception to merely remove boredom	0,954	2,797	2	116	0,065
8. Perception to look vintage	0,975	1,472	2	116	0,234
9. Perception to look more creative	0,988	0,705	2	116	0,496
10. Perception to have wider network	0,991	0,528	2	116	0,591
11. Perception to know the analog system	0,994	0,366	2	116	0,694
12. Perception to know the superiority and shortcomings of analog	0,999	0,079	2	116	0,924

The Tests of Equality of Group Means table above shows that only five items of perception (no.1 – no. 5) have a significant Wilks' Lambda value at the level <0.05. This means that five items show the differences between the groups of the camera type usage. The five items are:

- a) Perception to have unique analog camera images
- b) Perception to merely cultivate photography skills
- c) Perception to have different experience
- d) Perception to have photography references on analog camera
- e) Perception to look prestigious

Researchers employed the Box's 'M test to find out the equality of the variants. The results of the Box's M test are as follows.

Table 13 The Box's 'M Test Results

Box's M	17,770
Approx.	1,424
df1	12
df2	57100,454
Sig.	,146
Tests null hypothesis of equal population covariance matrices.	

As the Sig. of Box's M statistical test is = 0,146 (> 0,05) hence H₀ is approved. Thus, the variants of the data group are identical or homogeneous. In the discriminant analysis stage, stepwise method is used as follows:

Table 14 Discriminant Analysis

Step	Entered	Variables Entered/Removed ^{a,b,c,d}					
		Statistic	Between Groups	Min. D Squared			
				Statistic	df1	df2	Sig.
1	Perception to have unique analog camera images	,104	Digital Camera and Phone Camera	2,203	1	116,000	,140
2	Perception to look skillful in photography	,318	Digital Camera and Phone Camera	3,325	2	115,000	,039
3	Perception to merely cultivate photography skills	,319	Digital Camera and Phone Camera	2,205	3	114,000	,091

At each step, the variable that maximizes the Mahalanobis distance between the two closest groups is entered.

- a. Maximum number of steps is 24.
- b. Maximum significance of F to enter is .05.
- c. Minimum significance of F to remove is .10.
- d. F level, tolerance, or VIN insufficient for further computation.

From the analysis above, it can be inferred that three stages create three perceptions which distinguish the analog and digital camera users, respectively: (1) Perception to have unique analog camera images. (2) Perception to look skilful in photography. (3) Perception to merely cultivate photography skills.

Table 15 Perception Analysis

Variables in the Analysis				
Step	Tolerance	Sig. of F to Remove	Min. D Squared	Between Groups
1	,772	,000	,102	Digital Camera and Phone Camera
2	,761	,037	,136	Digital Camera and Phone Camera
3	,744	,007	,318	Digital Camera and Phone Camera

To find out how well each level of independent variables contributed to the model, The Wilks' Lambda test is used. The results of Wilks' Lambda test are as follows:

Table 16. Wilks Lambda

Step	Number of Variables	Lambda	df1	df2	df3	Exact F			
						Statistic	df1	df2	Sig.
1	1	,925	1	2	116	4,688	2	116,000	,011
2	2	,821	2	2	116	5,952	4	230,000	,000
3	3	,752	3	2	116	5,827	6	228,000	,000

The table shows the changing of Wilks' Lambda value

and F Value Test in each stage. The significance value < 0,05 reach at third step. Therefore, the three perceptions are all considered in discriminant model. The significance value for the three perceptions are: on step 1, F value = 4,688 with Sig. = 0,011; on step 2, F value = 5,952 with Sig. = 0,000; on step 3, F value of 5,827 with Sig. = 0,000. As the significance value is 0,000 (< 0,05) therefore all perceptions in each category actually have significant difference.

Table 17. Eigenvalues

Function	Eigenvalue	% of Variance	Cumulative %	Canonical Correlation
1	,307a	94,6	94,6	,485
2	,018a	5,4	100,0	,131

First 2 canonical discriminant functions were used in the analysis.

As shown above, Function 1 has Eigenvalues = 0,307 for three perception within that discriminant function. Function 1 may explain the 94,6% variants in the use of camera. The canonical correlation value shows the relation of discriminant value to the group. The canonical correlation value is 0,485, which means 23,85% variants of the independent variable (group) can be explained from the resulted discriminant model. The value 0,485 describes that its correlation is rather low.

Table 18. Wilks' Lambda

Test of Function(s)	Wilks' Lambda	Chi-square	Df	Sig.
1 through 2	,752	32,812	6	,000
2	,983	2,002	2	,367

Based on the Wilks' Lambda table above, it can be recognized that the factors used here were factor 1 up to 2 (or both existing factors) therefore Chi Square value is 32,812 and significant at 0,000. This thereby indicates a significant difference among the three groups of camera users. However, if only 2 factors were used, the difference becomes insignificant (Chi Square = 2,002 and significance > 0,05)

As carefully observed below, factor 1 describes the "perception to have unique analog camera images". Meanwhile, factor 2 is "perception to merely cultivate photography skills" and "perception to look skilful in photography".

Table 19. Standardized Canonical Discriminant Function Coefficients

	Function	
	1	2
a) Perception to have unique analog camera images	-,977	,194
b) Perception to merely cultivate photography skills	,645	,959
c) Perception to look skilful in photography	,511	-,841

These results were less consistent with the Matrix Structure below.

Table 20. Structure Matrix

	Function	
	1	2
a) Perception to have unique analog camera images	-,509*	,263
b) Perception to look skilful in photography	,405*	-,354
c) Perception to have different experience ^b	-,304*	,068
d) Perception to remove boredom ^b	,296*	-,014
e) Perception to gain prestige ^b	,293*	-,084
f) Perception to look more creative ^b	,246*	-,109
g) Perception to look vintage ^b	,192*	,050
h) Perception to have wider network ^b	,101*	-,016
i) Perception to merely cultivate photography skills	,458	,679*
j) Perception to now the system of analog ^b	-,077	,235*
k) Perception to know the superiority and shortcomings of analog ^b	-,117	,200*
l) Perception to have photography of analog camera images ^b	-,112	,158*

Pooled within-groups correlations between discriminating variables and standardized canonical discriminant functions

Variables ordered by absolute size of correlation within function.

*. Largest absolute correlation between each variable and any discriminant function. This variable not used in the analysis.

Based on the structure matrix table, factor 1 consists of: “perception to have unique analog camera images” and “perception to look skilful in photography”. Meanwhile

factor 2 consists “perception to merely cultivate photography skills”, as within that factor it has the largest absolute correlation between each variable and any discriminant function.

Function in Group Centroids can be interpreted as follows: (1) In the analog camera users group, the factor is 1, it is “to have a unique analog camera images” and “to look skilful in photography”. (2) Also, in the phone camera users, the factor is 1, it is “to have to have a unique analog camera images” and “to look skilful in photography”. (3) Meanwhile, in the digital camera users, the factor is 2, it is “to merely cultivate the photography skills”.

Table 21. Functions at Group Centroids

Camera type	Function	
	1	2
Analog Camera	-,803	-,077
Digital Camera	,058	,187
Phone Camera	,544	-,101

Unstandardized canonical discriminant functions evaluated at group means

However, glared at the negative sign on -0,803 score on analog camera, this thing can therefore be interpreted that the perception of respondents of analog camera users is not too "perceive the typical work of analog cameras" and "not look too skilful in photography." In contrast, respondents of phone camera users perceive "the work of analog cameras is unique and looks skillfull in photography". This can also be seen in the figure below.

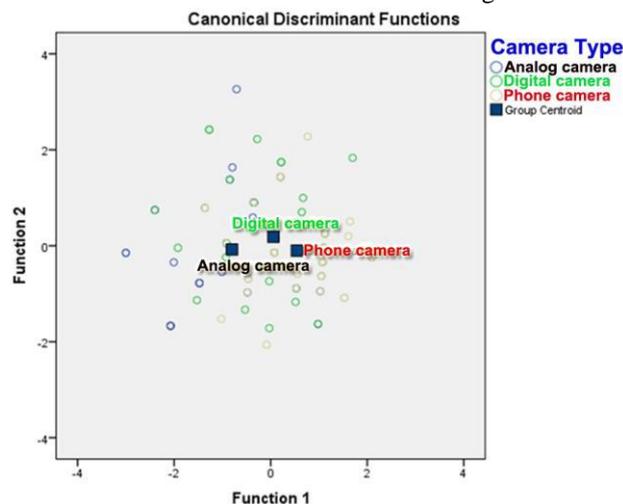


Fig.1: Graph of Individuals on The Discriminant Dimensions

The prediction of discriminant model reaches 47,1%, as seen on the cross-validated grouped cases correctly

classified in the following table.

Table 22. Classification Results

Classification Results ^{a,c}						
	Camera Type	Predicted Group Membership			Total	
		Analog Camera	Digital Camera	Phone Camera		
Original	Count	Analog Camera	18	10	6	34
		Digital Camera	10	15	14	39
		Phone Camera	7	12	27	46
	%	Analog Camera	52,9	29,4	17,6	100,0
		Digital Camera	25,6	38,5	35,9	100,0
		Phone Camera	15,2	26,1	58,7	100,0
Cross-validated ^b	Count	Analog Camera	17	11	6	34
		Digital Camera	11	14	14	39
		Phone Camera	8	13	25	46
	%	Analog Camera	50,0	32,4	17,6	100,0
		Digital Camera	28,2	35,9	35,9	100,0
		Phone Camera	17,4	28,3	54,3	100,0

- a. 50,4% of original grouped cases correctly classified.
- b. Cross validation is done only for those cases in the analysis. In cross validation, each case is classified by the functions derived from all cases other than that case.
- c. 47,1% of cross-validated grouped cases correctly classified.

Generally, it can be concluded that on the matter of perception, the use of analog camera is predicated on “perception to have unique analog camera images” and “perception to look skilful in photography” and “perception to merely cultivate photography skills”. The accuracy of the prediction achieves 47,1%.

4.3. Discussion

Theoretically, the phenomenon of analog camera usage can be viewed from the Uses and Gratification Theory. This theory suggests the problem of motive behind an action, on the other hand it is hope, which later stems to be perception. Therefore, the use of the dependent variables is predicated on motive and perception.

With the discriminant analysis, the camera (analog, digital, or phone camera) users are classified based on the motive and perception, as there might be a mingling of the participants’ exclusive characteristics which may allow the ambiguity of the factors which predicate the reason they use analog camera. The result of discriminant analysis shows those differences. From the motive perspective, the motives of “desire to experience analog camera” and “to gain prestige” distinguish the analog, digital, and phone camera users. The difference, however, is on the negative sign in the phone camera users.

Meanwhile from the perception side, factors “to have unique analog camera images” and “to look skilful in photography” are distinguishing the groups of those using analog camera and phone camera from the digital camera users. However, the analog camera users have more negative perception to those factors compared to phone camera users. Meanwhile, the factor of cultivating photography skills has become a distinguishing factor of the digital camera users group from the other two groups. To explain further, the accuracy of prediction from the discriminant model has actually achieved an average level (in perception), and rather enough in motive

V. CONCLUSION

The findings in this research suggest that there is a motive of desire to experience using analog camera and desire to gain prestiges in using analog camera. The accuracy of discriminant model achieves 57.1%. Meanwhile, from the perception view, the use of analog camera is predicated by “the perception to have unique analog camera images”, “the perception to look skilful in photography” and “the perception to cultivate photography skills”. The accuracy of the prediction reaches 47.1%.

However, it can be thereby concluded that in relation to the Uses and Gratification Theory, the use of media (camera) has correlation with motive and perception.

The recommendation from this research is that to increase the prediction of motive and perception as the distinguishing factors in using media, the future research may consider discovering other aspects, such as hope and other characteristics which are highly linked to the development of technology in this digital era.

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REFERENCES

- [1] E. M. Rogers, A. Singhal, and M. M. Quinlan, “Diffusion of innovations,” in *An Integrated Approach to Communication Theory and Research, Third Edition*, 2019.
- [2] E. M. Rogers, “Evolution: Diffusion of Innovations,” in *International Encyclopedia of the Social & Behavioral Sciences: Second Edition*, 2015.
- [3] E. M. Rogers, *Diffusion of Innovations, Fifth Edition*. 2003.
- [4] A. Malik, A. Dhir, and M. Nieminen, “Uses and Gratifications of digital photo sharing on Facebook,” *Telemat. Informatics*, 2016.

- [5] A. D. Smock, N. B. Ellison, C. Lampe, and D. Y. Wohn, "Facebook as a toolkit: A uses and gratification approach to unbundling feature use," *Comput. Human Behav.*, 2011.
- [6] K. C. Schröder, "News Media Old and New," *Journal. Stud.*, 2015.
- [7] D. H. Shin, "Understanding e-book users: Uses and gratification expectancy model," *New Media Soc.*, 2011.
- [8] C. Gan, "Understanding WeChat users' liking behavior: An empirical study in China," *Comput. Human Behav.*, 2017.
- [9] M. Mondri, P. Woods, and A. Rafi, "A 'Uses and Gratification Expectancy Model' to predict students' 'Perceived e-Learning Experience,'" *Educ. Technol. Soc.*, 2008.
- [10] M. C. Chou and C. H. Liu, "Mobile Instant Messengers and Middle-Aged and Elderly Adults in Taiwan: Uses and Gratifications," *Int. J. Hum. Comput. Interact.*, 2016.
- [11] A. Y. K. Chua, D. H. L. Goh, and C. S. Lee, "Mobile content contribution and retrieval: An exploratory study using the uses and gratifications paradigm," *Inf. Process. Manag.*, 2012.
- [12] C. P. Chen, "Understanding mobile English-learning gaming adopters in the self-learning market: The Uses and Gratification Expectancy Model," *Comput. Educ.*, 2018.
- [13] T. Huang, Z. Bao, and Y. Li, "Why do players purchase in mobile social network games? An examination of customer engagement and of uses and gratifications theory," *Program*, 2017.
- [14] E. Katz, J. G. Blumler, and M. Gurevitch, "Uses and Gratifications Research," *Public Opin. Q.*, 1973.
- [15] C. Cherniss, C. Roche, and B. Barbarasch, "Emotional Intelligence," in *Encyclopedia of Mental Health: Second Edition*, 2016.
- [16] Beely Jovan Sumakul, "PERANAN KOMUNIKASI KELUARGA DALAM PEMBENTUKAN IDENTITAS REMAJA DI KELURAHAN MALALAYANG I KECAMATAN MALALAYANG KOTA MANADO," *e-journal "Acta Diurna"*, 2016.
- [17] D. McQuail, *Mass Communication*. 2014.
- [18] J. D. H. Downing, D. McQuail, P. Schlesinger, and E. A. Wartella, *The SAGE handbook of media studies*. 2004.
- [19] D. McQuail, "Mass Communication," in *The International Encyclopedia of Political Communication*, 2016.
- [20] A. Ignatov, N. Kobyshev, R. Timofte, K. Vanhoey, and L. Van Gool, "DSLR-Quality Photos on Mobile Devices with Deep Convolutional Networks," in *Proceedings of the IEEE International Conference on Computer Vision*, 2017.
- [21] T. Schöps *et al.*, "A multi-view stereo benchmark with high-resolution images and multi-camera videos," in *Proceedings - 30th IEEE Conference on Computer Vision and Pattern Recognition, CVPR 2017*, 2017.
- [22] P. Pusparani and N. Rastini, "PENGARUH KUALITAS PRODUK DAN BRAND IMAGE TERHADAP KEPUASAN KONSUMEN DAN LOYALITAS PELANGGAN KAMERA CANON DIGITAL SINGLE LENS REFLEX (DSLR) DI KOTA DENPASAR," *E-Jurnal Manaj. Univ. Udayana*, 2014.
- [23] Y. Wang, Y. Liu, W. Heidrich, and Q. Dai, "The Light Field Attachment: Turning a DSLR into a Light Field Camera Using a Low Budget Camera Ring," *IEEE Trans. Vis. Comput. Graph.*, 2017.
- [24] M. Zhang *et al.*, "Precision multiband photometry with a DSLR camera," *Publ. Astron. Soc. Pacific*, 2016.
- [25] F. Williams and P. R. Monge, "Reasoning With Statistics: How To Read Quantitative Research," *Aust. Thomson Wadsworth*, 2001.
- [26] https://tekno.kompas.com/read/2016/09/13/10470087/ap.a.itu.kamera.mirrorless.bedanya.den_gan.dslr. Accessed in March 27, 2018
- [27] <https://tekno.kompas.com/read/2017/08/05/10465657/berkenalan-dengan-kamera-film-yang-kembali-digandrungi-di-indonesia?page=all>. Accessed in April 13, 2018
- [28] <https://www.antaranews.com/berita/658414/kamera-analog-kembali-dicari-kenapa>. Accessed in March, 27 2018
- [29] <https://tekno.kompas.com/read/2017/08/02/14282837/kamera-a-roll-film-ngetren-lagi-foto-35mm-ramai-di-instagram-tanah-air>. Accessed in March, 27 of 2018
- [30] <http://scdc.binus.ac.id/klifonara/2017/06/kelebihan-kamera-analog/>. Accessed in March 27, 2018
- [31] <https://daily.oktagon.co.id/kelas-pagi-kelas-fotografi-untuk-semua/>. Accessed in August 4, 2018