

The Impact of Young Adults' Lifestyles in Preference and Belief towards Communication Media

Siti Z.Z. Abidin, Nasiroh Omar, Zamalia Mahmud, Marshima M. Rosli and Hani F.A. Rahman

Abstract—Nowadays, there are a lot of communication media available for sharing information. The use of online media is among the common activities within the society of digital era especially for young adults. The Internet allows information to be shared freely, easily and fast through social media. Several studies show that information can be a weapon to influence people. The misuse of communication media may lead to threat. It is therefore important to understand the factors that affect people in selecting media and trusting their sources. In this paper, we present an exploratory study to investigate the patterns of media preferences and beliefs based on the young adults' lifestyles focusing on parents' education level, standard of living and their access to the internet. Participants comprise of ninety eight local young adults who use communication media regularly. Data were analyzed using multidimensional proximity scaling and multiple response techniques. The results show that media preferences are affected by their lifestyles while belief towards the communication media are not related to their lifestyles.

Keywords—Belief, Communication media, Multi-dimensional proximity scaling, Pattern, Preference, Social media, Visualization, Young adults.

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I. INTRODUCTION

THERE are a lot of communication media available for sharing information. The use of online media is among the common activities within the society of digital era especially for young adults. In current scenario, Arab world is facing increase in social protest that includes strikes and demonstrations, believe to have been initiated through 'virtual groups'. Despite of severe restrictions imposed by their governments, this virtual groups spread their influence through social media such as Facebook, blogs and Twitter [1]. Several studies show that information can be a weapon to influence people. The misuse of communication media may lead to threat [2]. Information plays an important role in influencing people's mindset and can be disseminated freely, easily and fast through social media. The Web has become a powerful influential medium to provide users with instant and global access to massive amount of information.

In this study, we further explore our works [2, 3] on the phenomena in order to gain insights and understanding on the media preferences and beliefs among the young adults, of whom are expected to be the future key players in communication of information via online medium in various private and government agencies. There are several factors that can influence the young adults in acquiring certain information. Academic background, lifestyle, living environment, habits are among various factors that could affect ones' preferences. In this paper, we present the exploratory findings through visualization of response patterns of the young adults on their preferences and beliefs pattern of communication media based on their lifestyles, focusing on parents' education level, standard of living and their access to internet.

This paper is organized as follows: Section 2 describes the related work whilst Section 3 presents the undertaken methodology. Section 4 provides the details on the results and analysis prior to the concluding remarks in Section 5.

II. RELATED WORK

Normally, there are two types of communication media that are commonly used in daily life; conventional

and online. Both offer either one-way or two-ways transfer of information. Research on exploring the preferable and trusted media has been carried out to distinguish how the choice of media differ between male and female [2]. Moreover, Schiano *et al.* [4] also investigated the media preferences across gender, to identify the reasons in choosing particular media products based on the frequency of usage and availability. Similarly, Stašova *et al.* [5] also analyze media usage across gender based on frequency of usage. Derived from the findings, two-ways media seems to attract young adults due to the social interaction. The social media allows anybody to access information and disseminate them to anyone who is ready and willing to respond to the opinion and commentaries in interactive and dynamic manner [6].

For online media, the Internet has played a very important role in this Information Age. Such online media become a means of reaching wider audience regardless of time and place. There are many research works which have been carried out to investigate the use of online media as the medium of communication [7-10]. Most of the research focuses on the impact of Internet addiction in causing problematic behaviour [7] and how the Internet affects people's daily life and socialization [9, 10].

In our previous study, we investigated the online media behavior of young undergraduate students relating to their preferences and trust for online activities. These students have access to the Internet faster than books, television, telephone, or any other technology for information and communication. Hence, university students are exposed to plenty of digital information via online media such as online newspapers, blogs, YouTube, Facebook, Yahoo Messenger and e-mails. We discovered that male and female respondents differ in their preference and trust for certain social media [2]. The preference for a particular media platform has a strong positive effect on people's mindset, especially for younger adults. Their preferences on online media are due to highly interactive medium where the interactivity allows the people to choose the information that they wish to access and at their own convenient time [11].

Several warfare studies show that information is a weapon [12]. The information is considered neutral and it does not have inherent meaning, however information can be manipulated to manage user perception. Therefore, synthesizing and communicating information are depended solely on the individuals. In open-access media communication, the impacts of individuals' perception may be able to influence others instantly while reaching to borderless communities and the use of online social media may lead to threat [6]. The dissemination of digital media as a way to acquire and share information is ubiquitous among young adult [13], however, new technologies and modern lifestyles lead to a new and meaningful ways to get involved in online activities via information-seeking and discussion. [14, 15]. Considering all this, it is reasonable to study the lifestyle of young adults that would influence their preferences of social

media. Thus, in this paper, we present our research findings on the clustering pattern of preferences and trusted media based on their lifestyles.

III. METHODOLOGY

A case study has been carried out in order to visualize the communication media preferences and beliefs of young adults. A self-administered paper-based snap-shot survey questionnaire was used to investigate the proximities in the patterns of responses. The response data were processed using SPSS16.0 and analyzed via multidimensional proximity scaling and multiple response techniques. A few screenshots from a tool called Murvis [16] are also included to enhance the visualization of the clustering patterns.

The data is based on ninety eight young adults who participated in this survey. They are university students at Universiti Teknologi MARA, Malaysia. The group consists of heterogenous background who were regular communication media users and they were selected based on several criteria which include having knowledge and exposure on different types of available online information and media communication. The participants were gathered in several designated locations where they were given ample time to complete the questionnaires. The questionnaire measures the respondents' perception and behaviours comprise of several sections; looking into subject's general profile, parents' education level, standard of living and access to internet.

All the selected answers were converted into binary codes in which for each answer, the value '1' represents a 'yes' or preferred activity and '0' represents a 'No' for non-preferred activity. Each attribute was labeled for reference and identification. The data was analyzed using multidimensional proximity scaling technique where it enables the users' response pattern to be formed and visualized into two-dimensional solutions.

Multidimensional scaling (MDS) starts with a data set of proximities, which indicate the degree of similarity or dissimilarity among elements in the defined set. The objective of multidimensional proximity scaling is to take proximities data and represents the elements in small dimensional space so that the distances among the elements in the space accurately represent the original proximity measures [17-19].

IV. RESULTS AND ANALYSIS

Since the aim of the study is to analyze how the personal background can influence the young adult's lifestyle, there are three main factors studied that include parents' education level, standard of living and access to internet [20]. Based on these factors, the impact of young adults' lifestyle are examined and visualized on their media preferences and the media sources that they believe contain reliable information.

A. Media Preferences based on Lifestyle

The media preference is defined as the sources of information that the young adults often use. In this study, the selected media are as follows; television, poster, Facebook, online newspaper, social networking (e.g. Myspace), radio, email, Yahoo messenger, global news (e.g. CNN), close relation, telephone, blogs, newspaper (paper-based), rumors and You tube.

The following sub-sections discuss the results based on the studied parameters.

1) Parents' Education Level

With the assumption that parents are the most influential people to any person, the parents' educational level is one of the criteria in the survey. Since the young adults came from different places throughout the nation (one of the developing countries), there are various parents' education levels which include primary school, lower secondary, upper secondary school, diploma, bachelor degree, master, PhD and others.

The two-dimensional solutions in Fig. 1 shows that students of parents at all education level with an exception of upper secondary school prefer to use email and yahoo messenger. They also incline towards the online newspaper and visual Global News.

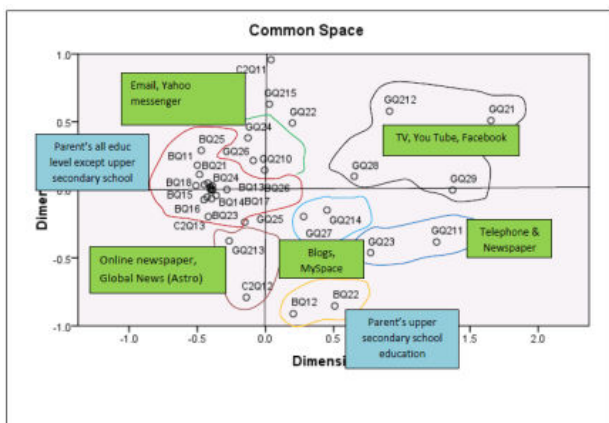


Fig. 1: Parents' Education vs. Media Preference

Parents of students with upper secondary education level are more incline towards using blogs and MySpace for sources of information and less incline towards the newspaper and telephone. Surprisingly very few were inclined towards TV, You Tube and Facebook as sources of information.

2) Standard of Living

Standard of living is an important factor that can influence one's lifestyle. The survey focuses on four issues that include the followings:

- Living in a city
- Living in a village
- Type of house
- Available media at home

Mostly, the lifestyles of people who live in the city are different from people who live in the village. The main differences are infrastructure, facilities and daily activities. Village people usually work in agriculture area without fixed monthly income. In contrary, the city people mostly work at offices and considered as professional workers.

In terms of the type of houses that people live, the city usually has several types of houses that differentiate between people with different lifestyles. Unlike the city, in the village the house type is very much similar from one another.

Even though the type of available media at home is considered as one of the important issue here, this is due to the reason that people in the village usually rely on what they have at home. On the other hand, city people may not be similar because there are a lot of facilities available and there are also cyber cafés at almost every residential area for people to get access to the Internet.

Fig 2 shows that among those who live in the city, they prefer to watch Astro (monthly rented TV channels), Blogs and Poster as their main sources of information. Their second most preferred sources of information are Yahoo messenger, email and radio followed by Social Networking and Rumours at third most preferred media. The least preferred media for sources of information are newspaper, online newspaper, Facebook and TV for those who lived in the village.

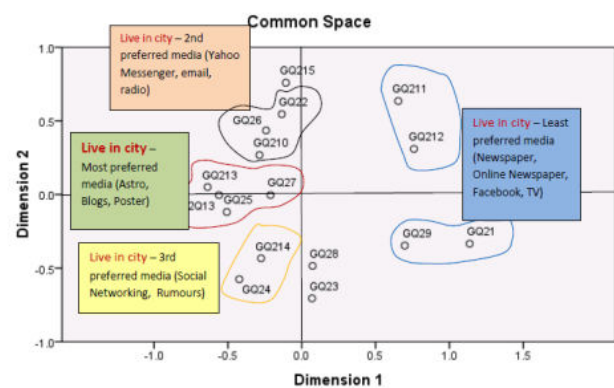


Fig.2: Living in City vs. Media Preference

Fig. 3 shows that their most preferred source of information is radio, followed by information obtained from family and close friends. Some would also prefer to look at email, Yahoo messenger and online news as other sources of information even though it is not quite prevalent. It was discovered that they prefer Social networking, Rumours, YouTube and Facebook the least.

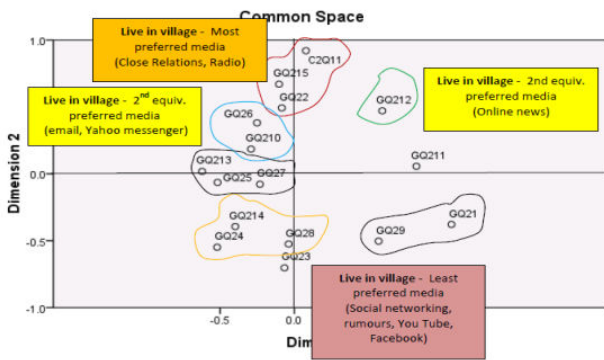


Fig.3: Living in Village vs. Media Preference

For the type of house, those who lived in double storey link houses, single storey bungalow and quarters, their most preferred source of information are YouTube, Blogs and Social Networking. Their second most preferred media are Global news and Rumours and they least prefer to read newspaper, email and Facebook for sources of information (refer Fig. 4).

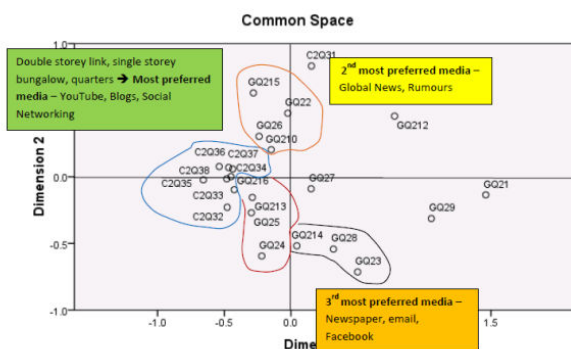


Fig.4: Type of House vs. Media Preference

Fig 5 shows that those who own a TV tend to refer to TV as their main source of information. Those who own a TV also own a computer which led to their second most preferred source of info which is the Yahoo Messenger. Those who own both TV and computer also own a radio.

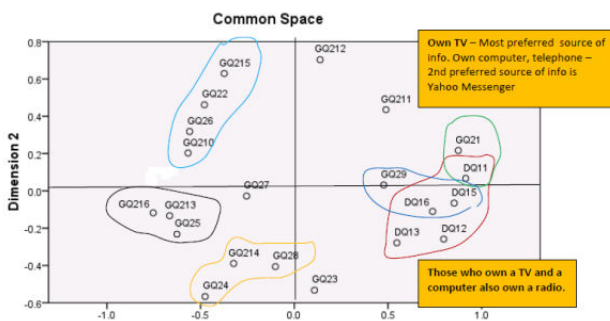


Fig.5: Availability vs. Media Preference

In order to look into further details of the results, the analysis is also performed to measure the percentage of responses as depicted in Table 1.

Table 1: Available Media for Multiple Response

Media available Frequencies	Responses			Rank
	N	Percent	Percent of Cases	
D-Q1-1 (TV)	92	24.6%	96.8%	1
D-Q1-2 (Radio)	72	19.3%	75.8%	3
D-Q1-3 (Newspaper based)	58	15.5%	61.1%	5
D-Q1-4 (Others)	2	.5%	2.1%	6
D-Q1-5 (Computer)	81	21.7%	85.3%	2
D-Q1-6 (Telephone)	69	18.4%	72.6%	4
Total	374	100.0%	393.7%	

It shows that over 90% of respondents each owned a TV, followed by 85% owned a computer and 76% owned a radio. This result shows that the standard of living has an impact on the choice of media. People who can only own television tend to choose TV for preferable media because they cannot afford to have the computer and pay the Internet access.

3) Access to Internet

Since most of current social media rely on the Internet access, this study also explore the young adults' behavior in using the Internet. For those do not have an Internet access at home may get access at the cyber café. They are asked how frequent they visited the cyber café and the distance between their homes to the café. In addition, the frequency of using the online media is also enquired.

Fig. 6 shows that among those who visited Cyber cafe every day, their most preferred media are Blogs, YouTube and Social Networking. On the other hand, those who never go to Cyber cafe prefer radio and Global News via Astro as their source of information.

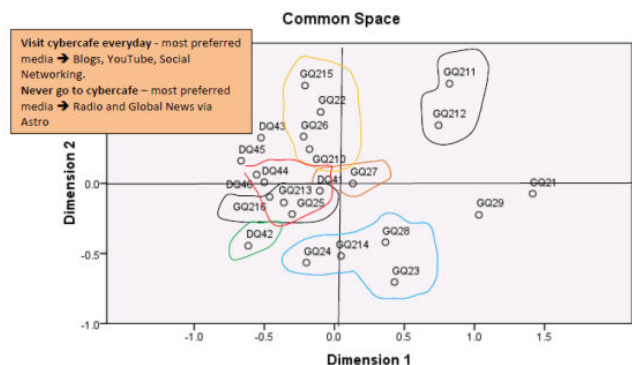


Fig.6: Internet Access vs. Media Preference

Those who live at less than five kilometres away from Cybercafe prefer Facebook and television as their source of information. On the other hand, those who live at more than ten kilometres away from the Cybercafe prefer Social Networking and Blogs. The young adults who live within five to ten kilometres of radius, prefer Global News. There were moderate use of telephone, rumours and social networking for those who live within the ten kilometres radius from Cybercafe (Fig 7).

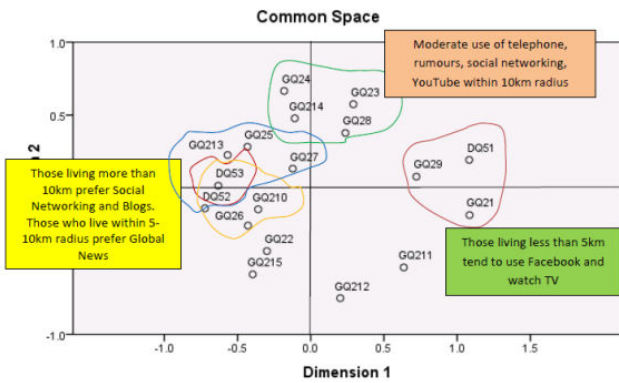


Fig.7: Location vs. Media Preference

Furthermore, it is also significant to study the frequency of media usage at certain time intervals. Those who retrieve information hourly and weekly normally use Blogs and Social Networking while those who watch TV tend to retrieve information daily from the respected media (Fig.8).

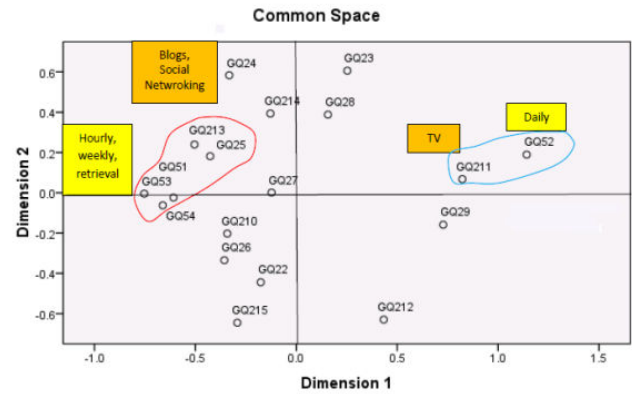


Fig.8: Frequency of Usage vs. Media Preference

The access to Internet is depended on the availability of sources to the young adults. If the computer and Internet are available, the young adults would prefer using the online media rather than others.

Based on a commonly available media at home (television, radio, newspaper, computer and telephone), the analysis on media availability and usage frequency are examined and illustrated in Table 2.

Table 2. Media availability vs. frequency of usage

			Media_available by cybercafe Crosstabulation						
			Visit cybercafe						
			Never	Several times per week	Once a mth	Everyday	Once a week	Once in 3 mths	Total
Media available at home	TV	Count	22	27	18	4	13	9	92
		% of Total	23.2%	28.4%	18.9%	4.2%	13.7%	9.5%	96.8%
	Radio	Count	19	19	14	4	10	7	72
		% of Total	20.0%	20.0%	14.7%	4.2%	10.5%	7.4%	75.8%
	Newspaper	Count	17	16	10	3	6	6	58
		% of Total	17.9%	16.8%	10.5%	3.2%	6.3%	6.3%	61.1%
	Others	Count	1	1	0	0	0	0	2
		% of Total	1.1%	1.1%	.0%	.0%	.0%	.0%	2.1%
Computer	Count	23	21	14	3	12	8	81	
	% of Total	24.2%	22.1%	14.7%	3.2%	12.6%	8.4%	85.3%	
Telephone	Count	21	18	14	4	6	7	69	
	% of Total	22.1%	18.9%	14.7%	4.2%	6.3%	7.4%	72.6%	
Total	Count	23	27	19	4	14	9	95	
	% of Total	24.2%	28.4%	20.0%	4.2%	14.7%	9.5%	100.0%	

Percentages and totals are based on respondents.

From Table 2, majority of young adults tend to access the common media about several times per week. They tend to use computer, television and telephone more often than other media. This can be seen in the frequency of usage across weekly and monthly basis. In general, television is the prominent media across all duration and frequency of usage among the stated media.

B. Media Preferences based on Lifestyle

Respondents are also required to state their beliefs in choosing the media sources that can give them reliable information. The sources of media encompass of television, poster, facebook, online newspaper, social networking (e.g. MySpace), radio, email, Yahoo Messenger, global news (e.g. CNN), telephone, blogs, newspaper (paper-based) and You Tube. Fig 9 shows the clustering pattern of media in relation to all respondents' belief. The attribute's value of GQ31 (television) which is located at the upper most scale indicates that the respondents believe the most reliable sources of information is television. The rest of the media choices have about equal in trustworthy.

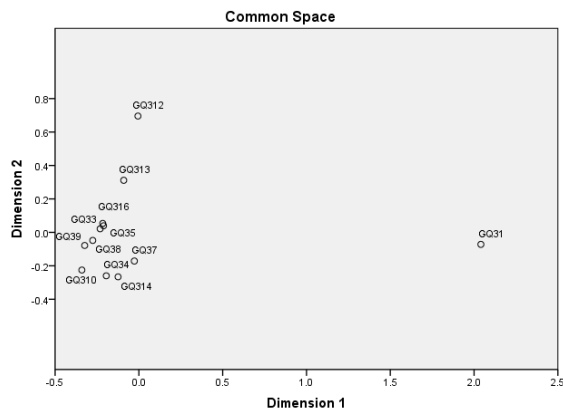


Fig 9. The pattern of respondents' belief

Further analysis of the results is depicted in Table 3. The media are rank according to percentage of respondents' (cases) answers. The top five ranking are gained by conventional media starting from television, telephone, poster, radio and newspaper, respectively. The blogs have the highest ranking for the online media, even though the rank is similar to the newspaper. Thus, it can be concluded that the online media has not gain much trust from the young adults.

Table 3. Respondents' belief media ranking

	Responses		Percent of Cases	Rank Order
	N	Percent		
Belief ^a TV	85	27.7%	93.4%	1
Poster	30	9.8%	33.0%	3
Facebook	13	4.2%	14.3%	11
Online News	19	6.2%	20.9%	8
Socia Netwk	8	2.6%	8.8%	12
Radio	23	7.5%	25.3%	4
Email	17	5.5%	18.7%	9
Yahoo Msgr	16	5.2%	17.6%	10
Global News	20	6.5%	22.0%	7
Telephone	31	10.1%	34.1%	2
Blogs	22	7.2%	24.2%	5.5
Newspaper	22	7.2%	24.2%	5.5
You Tube	1	.3%	1.1%	13
Total	307	100.0%	337.4%	

a. Dichotomy group tabulated at value 1.

Since all the respondents can choose more than one type of media, it is important to see the similarity among the respondents' answers. Further analysis of the MDS result is enhanced by using a tool called Murvis [16] to provide colored clustering pattern of cases based on attributes. Fig 10 shows the clustering pattern of all respondents' belief according to the media types (attributes). The scattered coordinates indicates that there are less similarity among their choices.

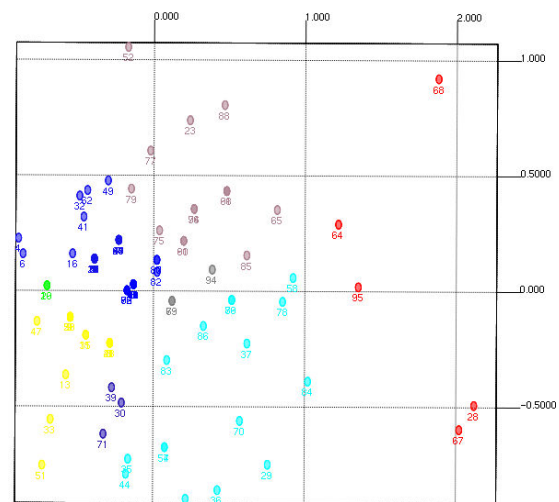


Fig 10. Pattern of respondents' belief

Due to the contradicting results between media preferences (in Section 4.1) and beliefs, the correlation between respondents' lifestyle and their beliefs are examined based on the selected factors that include the followings:

- Parent's education
- Standard of living (hometown and type of house)
- Access to internet (distance and frequency)

Later, the impact of the young adults' lifestyle on their media preferences and beliefs can be compared.

1) *Belief versus Parent's Education*

With the similar reason as in the media preference analysis, parents' education is expected to influence the young adults' upbringing and hence affect the young adults' beliefs. Fig 11 depicts the pattern of media beliefs versus father's education.

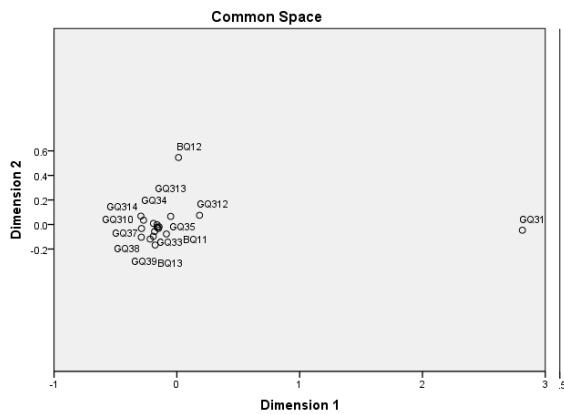


Fig 11. media beliefs (attributes)

It can be visualized that the clustering pattern of the MDS output gives almost similar pattern to beliefs' pattern in Fig 9. However, the degree of similarity among the respondents' answers is lesser for the father's education. This is shown through the distance between the attributes' coordinates.

Further analysis is also carried out by using Murvis for colored enhanced visualization on all respondents as shown in Fig 12.

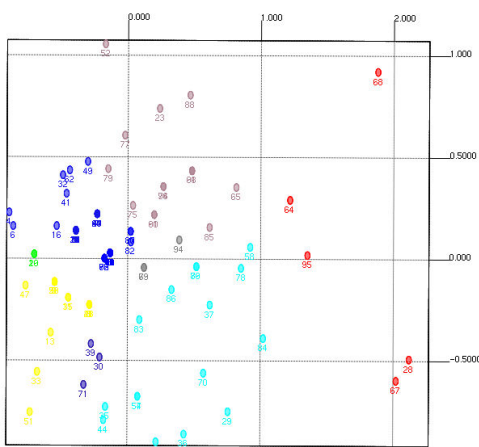


Fig 12. Father's education vs. belief (cases)

The clustering pattern in Fig 10 and Fig 12 gives almost identical view. Therefore, the father's education has no effect on the young adults' beliefs.

The analysis is also performed based on young adult mother's education and the combined parents' education. Similar results are also obtained.

2) *Belief versus standard of living*

Next, another analysis is carried out to examine the effect of living condition on the young adults' beliefs. Two factors, namely *Living in City*, and *Living in Village*, are combined as *Hometown*. Fig. 13 illustrates the output of the results with quite similar clustering pattern to the young adults media beliefs (Fig 9), but the coordinates are more scattered.

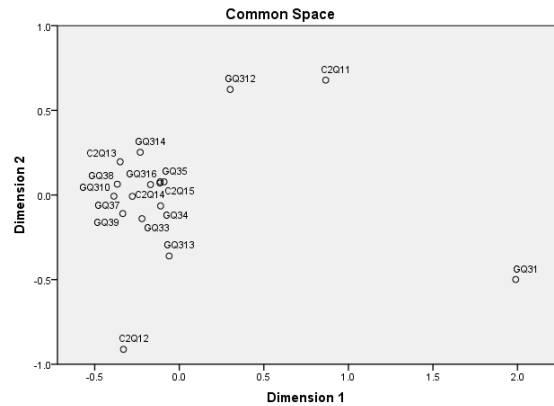


Fig 13. Belief vs. hometown (attributes)

The study on another factor for standard of living (*Type of House*) is also carried out. Fig 14 shows the results of young adults belief in relation to their type of houses. The results also portray almost similar clustering pattern to *Hometown*.

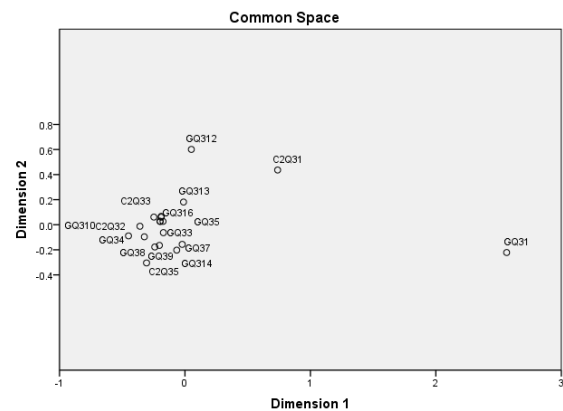


Fig 14. Belief vs. type of house (attributes)

The scattered distance demonstrates that the living condition has no significance towards the young adults' beliefs.

3) Belief vs. Access to Internet

For Access to Internet, two parameters are inspected; Location and Frequency. Fig 15 illustrates the results of respondents' beliefs in relation to location.

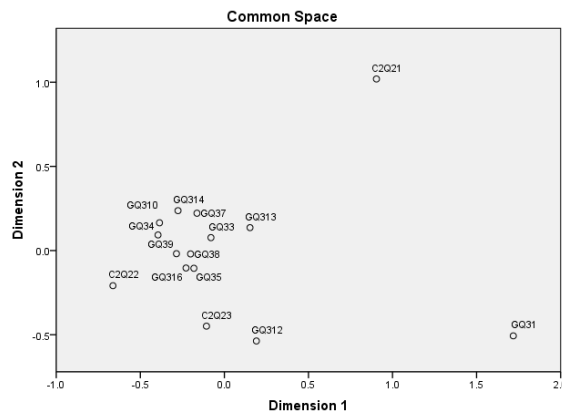


Fig 15. Belief vs. location (attributes)

The results maintain the same clustering pattern with the coordinates inclined towards the values in both dimensions.

When looking at the Frequency factor, the results still yield the similar clustering pattern, however, the distance between the attributes (except GQ31, television) are very close together. Fig 16 depicts the results.

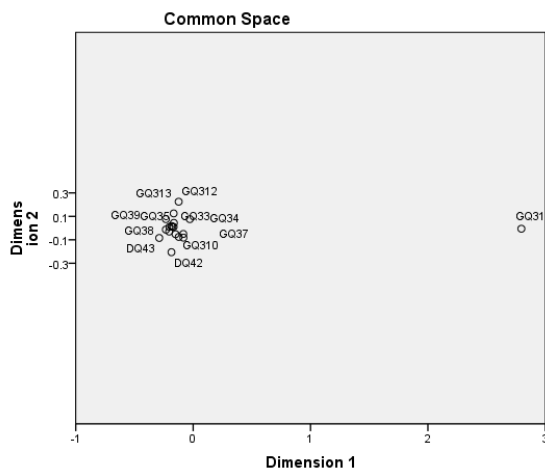


Fig 16. Belief vs. frequency (attributes)

In summary, unlike the media preference, young adults' beliefs in selecting communication media are not influenced by their lifestyles. In addition, their selected and trusted media are prone to conventional media rather than the online media.

V. CONCLUSION

In this paper, we have presented our work on exploring the media preferences and beliefs for young adults who are

familiar with many types of communication media. A survey is conducted to explore their family background, standard of living and the possible access to the Internet. The results indicate that the young adults tend to prefer the online media such as Blogs, YouTube and Social Networking when such media are available either at their homes or nearby cyber cafés. Although television is found to be the most available media at home as compared to computer and others, the standard of living has some influence on their choices of preferred media. It can be summarized that all the factors considered in the survey to a certain extent have some significances towards the young adults' choices of preferred media.

However, unlike the media preference, the results of the analysis for young adults' beliefs in selecting the sources of information are somewhat different. The impact of lifestyles almost has no significance in determining the young adults' belief of the trusted media.

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