

Digital Divide and Participatory Outcome in Politics among Youth: A Comparative Analysis between Generation Z and Millennial Youth in Bangladesh

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DOI: <https://dx.doi.org/10.47772/IJRISS.2025.9020078>

Received: 17 January 2025; Accepted: 28 January 2025; Published: 03 March 2025

ABSTRACT

The digital divide highlights the gap between those who have access to digital resources and those who do not. Recent academic discussions have centered on digital inclusion, exploring how it shapes participatory outcomes in the context of the digital divide. Digitalization has woven itself into the fabric of our lives, bringing both bright opportunities and shadowy challenges, sparking lively discussions in academia. In developing countries, the impact of digital accessibility is especially evident among the youth, with Bangladesh serving as a notable example. Bangladesh, one of the youngest nations in the world, holds immense potential for youth empowerment through digital access. This research uncovers the connections between digital accessibility and its effects on society and politics. A survey reveals a story of the digital divide, exploring how it has opened doors for youth to engage in politics through e-participation and whether this involvement has truly empowered them. The findings reveal a significant shift: bridging the digital divide has eased the barriers to political participation. Digital access ignites civic participation, boosts voter turnout, and fuels political activism among youth, especially through social media and online platforms. In Bangladesh, heightened engagement sparks a wave of political involvement, empowering the youth to lead the charge for democratic restoration.

Keywords: Digital divide, e-participation, Participatory outcome, Political engagement, Gen Z youth, Millennial youth, Bangladesh

INTRODUCTION

Technological developments completely change our way of life and means of subsistence. But the effects of technology—positive or negative—are not equally shared worldwide, or even inside a single country or society (Antoci, 2015). While many boats have been raised by the digital revolution, not all, nor to the same degree. The digital gap exists across many socioeconomic, cultural, gender, and ethnic aspects notwithstanding age differences and disparities. Particularly among young people in underdeveloped nations, internet access, and online networks have brought about profound and quick economic and cultural changes in recent years, thereby changing social relations and political activity.

Commonly known as e-participation, the link between the use of digital media and political engagement developed as an academic debate in the late 1990s and has been the focus of many research. Mostly incorporating clicktivism, hacktivism, blogging, citizen journalism, and more, e-participation in politics and social life occurs via online media and social networks (Bimber, 2014). Important topics of debate include social media's effects on local and worldwide communities as well as its function in enabling young involvement in political and democratic procedures.

The progression of Information and Communication Technology (ICT) has considerably reduced the digital divide. The initial decade of the 21st century is frequently considered the social media revolution, as platforms such as Facebook, Twitter, Google, and YouTube achieved significant popularity, especially among younger demographics. Communication technology, particularly smartphones, have progressively grown more accessible

and inexpensive, especially in underdeveloped countries. Thus, internet accessibility has impacted not only societal and economic spheres but also cultural and political realms, influencing worldwide occurrences and interactions.

Social media and mobile technology have transformed the dissemination of information, significantly contributing to citizen participation. Movements like the Arab Spring, the worldwide Occupy movement, the African Spring, and the South Asian revolutions against authoritarian governments have all had considerable young involvement (Tafi, 2024). In these movements, access to information via informal channels such as social media was crucial in reinstating democracy and opposing authoritarianism through e-participation (Haythem, 2021).

For some years, pundits have consistently emphasised Generation Z's distinctive political involvement. A poll of Generation Z in the United States indicated that over 75% regard political engagement as an essential aspect of their identity and are active in social or political initiatives, with a significant number partaking in boycotts. Traditionally, younger generations in American culture have exhibited diminished voter turnout rates; nevertheless, this tendency has markedly changed in recent years (Lajward, 2024).

In his piece "*Gen Z's Political Paradox*," Lajward Zahra examines the ambiguity over Generation Z's engagement in politics. He observes that although Generation Z is profoundly concerned with political matters, many do not partake in conventional modes of involvement, such as voting. Zahra ascribes this phenomenon to their dependence on social media for political news, which enhances their awareness but diminishes participation in traditional political activities (Lajward, 2024). De Guzman concurs, noting that polls continually indicate that young individuals exhibit significant interest in diverse problems and engage in discussions about them on social media (Galdonez, 2024). These findings indicate that social media and internet platforms generate substantial prospects for young political participation.

Bangladesh serves as an exemplary case of e-participation, political engagement, and youth empowerment. The participation of youth, especially Generation Z in the 2024 mass movement, termed the July Revolution, was crucial in reinstating democracy and opposing the authoritarian administration of Sheikh Hasina. The initiative, which sought to guarantee equal rights for all, was predominantly propelled by social media (Ahmed, 2024). Digital platforms significantly facilitated mobilisation, with Generation Z leading the movement, which further enhances the significance of this study

OBJECTIVES OF THE RESEARCH:

This research was conducted through fieldwork to explore key objectives related to the digital divide among Bangladeshi youth, particularly between Generation Z and Millennials, and its impact on e-participation in civic engagement. The primary objectives of this study were threefold.

Firstly, the research aimed to investigate and identify the digital divide at the first and second levels. Secondly, it sought to explore the participatory outcomes of the third-level digital divide, particularly in the context of political activism on online platforms. Lastly, the study aimed to compare the e-participation and participatory outcomes of the digital divide in political participation between Generation Z and Millennial youth in Bangladesh.

SCOPE OF THE STUDY

The study aims to examine the relationship between the variables, e-participation (regarded as the independent variable) and civic participation, election turnout, and political activism in online platforms (the dependent variables), with a focus on the dimensions of gender and generation (millennial and generation z).

METHODOLOGY OF THE STUDY

This study followed quantitative research techniques. To gather information, a combination of secondary and primary sources was used. An extensive desk review was conducted to build a strong argument by triangulating the data.

Population and Sample Size Determination

The study encompasses the entire youth population in Bangladesh, aged between 18 and 35. It highlights participation from individuals of different genders with diverse social, economic, educational, geographical, and occupational backgrounds, including those working within government institutions. Therefore, the population was well-defined, and a sampling frame was available.

Sampling of the Research

To calculate the actual sample size for a finite population, the single population proportion formula can be used, following Naing et al. (2006) and Daniel (1999). The following assumptions were considered: a 95% confidence interval (CI), a 50% proportion (due to the lack of previous studies), and a 5% margin of error. The sample size was then computed as follows:

$$n = \frac{Z^2 P(1-P)}{d^2}$$

- Where; n = sample size
- Z = Z statistic score for a level of confidence, Z-value is 1.96 for the two-tail test at $\alpha = 5\%$ (CI = 95%)
- P = expected prevalence or proportion (P = 50%), for unknown population variance, and
- d= represents the maximum tolerable error (default value = 5% when the population variance is unknown)

According to the formula, the study requires a minimum sample size of approximately 385 participants from the entire population. For this research, the sample consisted of 400 youth, aged between 18 and 35. This study achieves representativeness through a balanced sample, comprising of 236 youth from urban areas and 164 youth from rural regions, thereby reflecting regional diversity. However, a larger sample size could not be selected due to resource constraints.

Data Collection Techniques

A systematic random sampling technique was used to select the desired number of samples from the sampling frame. A survey was then conducted using multiple techniques, using a well-designed semi-structured questionnaire. Multiple Google Forms, phone calls, and direct interview techniques were used to collect the data for research. For the direct interview, Dhak district, Satkhira, and Rajshahi districts are selected for the survey. In the Phone call, randomly called the phone, and called the data from the required population. In the case of Google Forms, multiple social groups are used as a platform for the collection of data. The survey was conducted between August 2024 and November 2024.

Analysis and Interpretations of the Data

Quantitative data were analyzed using the Statistical Package for the Social Sciences (SPSS). Descriptive analysis, including frequency tables, was used to describe the existing skill gap among youth at different levels and explore their political participation.

CONCEPTUALIZATION AND THEORETICAL DISCUSSION

Levels of Digital Divide

The current decade is known as the "age of information" and the "digital revolution." It is challenging to describe and quantify the complex phenomena of digital skills and the participatory outcomes of the digital divide. Even though talent development is a continuous process, abilities acquired today might not be useful tomorrow. A rising problem, the digital divide differs according to age, gender, social situation, and cultural viewpoints. The disparity between individuals who have access to digital devices and those who do not is known as the first level digital divide. The demand and results of digital access are the basis for the ongoing development of theories and conceptions by experts.

Three stages of the digital divide are identified by the causal model of resources and appropriation theory, which was established by Professor Alexander J.A.M. van Deursen, a renowned expert in the topic of digital inequality. Physical device access, the motivational attitudes associated with utilizing digital equipment, and the goal of using digital gadgets are the main topics of the first level. According to Van Deursen, having enough drive, resources, and abilities is important, but it's not always enough for practical application. There may still be notable disparities in skills and internet usage patterns even if physical access to digital devices has increased (Van Deursen, 2013).

The Korean Agency for Digital Opportunity issued a paper that provides a comprehensive definition of the digital gap in two sections. The first level, known as the "basic digital divide," separates users from non-users according to factors like access to digital devices, proficiency with them, and their intended use. The second level takes into consideration a variety of barriers, including those relating to age or geography. The distinction between power users and passive users, or between productive and consumer users, is also measured at the second level. The first level, which emphasizes the disparity between IT users and non-users and reflects the problem of equal access to digital resources, is referred to as a vertical digital divide. The second level, on the other hand, is a horizontal digital divide that looks at differences between IT users who have access but have different usage goals and skill sets (Park, 2014).

The idea of the digital divide has changed and grown more complex throughout time, impacted by elements like the availability of devices, the quality of the internet, pertinent information, user knowledge and abilities, and the intended usage. There are now two different categories of research on this subject. One group uses a vertical definition of the divide, focusing on qualitative growth and quantifying it in terms of gaps in skills, usage, and access. The second group takes a horizontal stance, emphasizing internet availability on a national and international level (Acharya, 2017).

One of the most important theories on the digital divide is the Causal Model of Resources and Appropriation Theory of the Digital Divide, which was created by Professor Jan A.G.M. van Dijk.

A Causal Model of Resources and Appropriation Theory of the Digital Divide (Modified by the researcher)

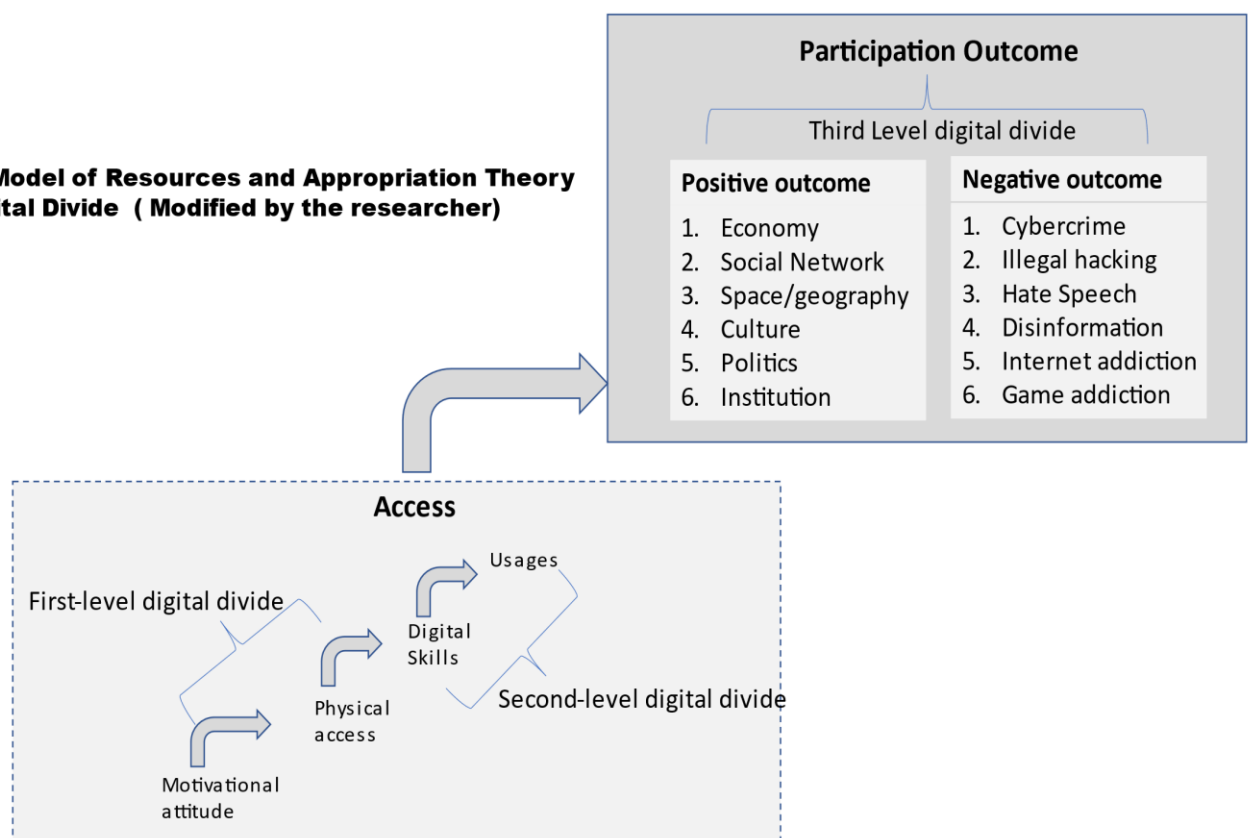


Figure 1: A causal model of resource and appropriation theory of the digital divide

Source: Closing The Digital Divide (Pick & Avijit, 2016)

The model indicates that access to digital tools (first-level digital divide), proficiency in their use, and the intended purpose of these tools (second-level digital divide) result in differing outcomes (third-level digital divide). Outcomes may be categorized as positive, including economic growth and cultural engagement, or negative, such as cybercrime and addiction. This study primarily examines the third level of the digital divide concerning political outcomes.

Digital accessibility facilitates citizen engagement in politics via e-participation. The significance of the Internet extends beyond mere access to information; it encompasses the capacity of computer networks to empower citizens. It has been proposed that technological advancements could empower individuals to transition from mere citizenship to active participation as citizen governors (Winner, 2003).

Who are the different Generations?

The oldest generation categorized is the 'silent generation' born between 1928-1945, have seen the great depression and WWII and their key traits being resilience and valuing tradition. The generation after is known as the 'baby boomers' born between 1946-1964 experienced the post-war prosperity and many social movements and their key traits were focus on success and individualism. 'Generation X' born between 1965-1980 is the successor of the boomers and they have seen the rise of technology and globalization; their key traits include independence, valuing work-life balance. Gen X is followed by the millennials (born between 1981-1996) and Generation Z (born after 1996 till 2009). The millennials are characterized as tech-savvy, socially conscious and entrepreneurial and Gen Z (zoomers) as digital natives, inclusive and innovative (Bialik & Fry, 2019).

Because Generation Z and Millennials are so important in determining internet participation and political engagement, this study primarily focuses them. As digital natives and Millennials, adaptive consumers of technology, Gen Z reflects the young generation influencing social and political change. Their different approaches—Millennials' inclination for indirect contributions and Gen Z's direct participation provide insightful analysis of changing civic behavior.

e-Participation and Political Activism: Youth Apathy and empathy in Politics

The question of why individuals exhibit interest in politics frequently emerges. Resource theories identify three essential resources that facilitate citizen participation in political activities: time, money, and civic skills. Time and financial resources are of significant importance. Time enables citizens to engage in political activities such as campaigning, attending community meetings, or volunteering. Financial contributions may be made to candidates, political parties, or organizations involved in political activities. Civic skills, including communication and organizational abilities, are essential for political participation.

E-participation enables citizens to surmount resource constraints, especially regarding time and financial limitations. Traditional political participation frequently requires significant time and financial resources, primarily due to the necessity of travel and in-person engagement. Civic skills are generally obtained through both formal and informal institutions, including family, educational systems, voluntary associations, and religious organizations. Brady (1995) found that 53% of adults acquired civic skills via non-political institutions. E-participation, especially via social media, has created new opportunities for civic engagement and political involvement, enabling citizens to overcome conventional obstacles. While social media and online platforms are typically informal, they can, in certain instances, surpass formal channels in facilitating mass political engagement.

A significant amount of research has examined the evolving nature of citizens' participatory behavior in politics. One perspective posits that political participation has diminished due to limitations in time, financial resources, and civic competencies. Engagement in activities such as joining political parties, participating in campaigns, or voting has declined, especially in national elections (Brady, 1995). This perspective posits that conventional methods of political participation are diminishing in attractiveness, particularly among younger cohorts, notably Generation Z (Bakker T. P., 2011). Conversely, scholar Cliff Zulkun presents an alternative viewpoint that challenges the idea of youth apathy. He argues that "simple claims that today's youth are apathetic and disengaged from civic life are simply wrong." The internet provides numerous avenues for political engagement,

such as accessing political blogs, conducting research, following online news, participating in forums, engaging in political discussions via email, and organizing electronic petitions (Bakker T. P., 2011).

Conceptual framework of e-participation and participatory outcome among youth in politics

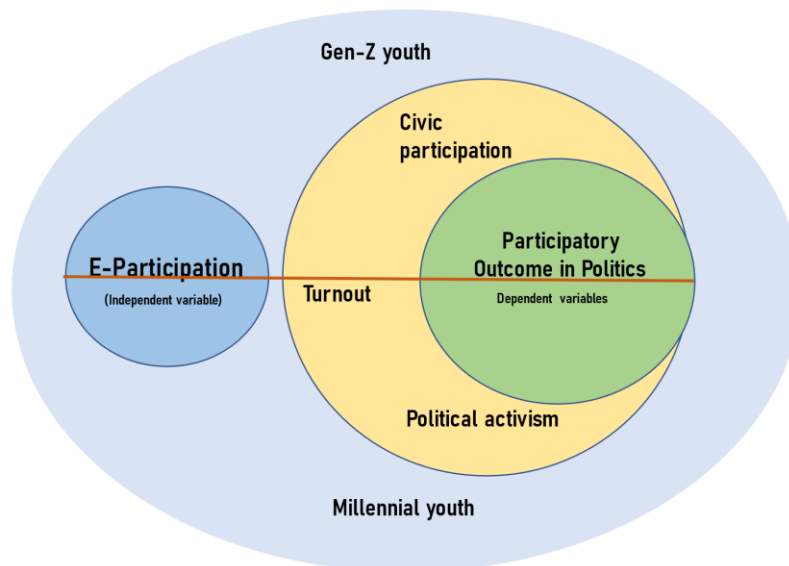


Figure 2: Conceptual Framework of e-participation and participatory outcome among youth in politics

Source: developed by the author

The conceptual framework illustrates the relationship between e-participation as the independent variable and participatory outcomes, including civic participation, voter turnout, and political activism, as the dependent variables. Generation Z and Millennial youth are cited as examples of how internet engagement influences their political participation. The framework suggests that online involvement through digital platforms (e-participation) plays a crucial role in shaping how youth engage in politics, both in traditional forms such as voting and in modern methods like social activism. It provides a linear understanding of youth e-participation in politics and its outcomes for Generation Z and Millennial youth. Overall, the framework highlights the transformative impact of digital technologies on youth political involvement.

FINDINGS AND DISCUSSION

Socio-Demographic Characteristics of Study Population

The social survey method was used to collect primary data from individuals. General information regarding the sampling is provided based on the respondents. The most common socioeconomic characteristics among the respondents are outlined below, as they are relevant to the analysis of the research findings.

Table 1: Percentage distribution of study population by demography, age, and gender

Ages Group	Rural			Urban			Total		
	Male	Female	Total	Male	Female	Total	Male	Female	Total
18-22	38	24	62	22	14	36	60	38	98
23-27	23	12	35	37	30	67	60	42	102
28- 32	25	17	42	47	39	86	71	56	127
33- 35	16	9	25	27	20	47	44	29	73
Total Number (N)	102	62	164	133	103	236	235	165	400

For this research, age, gender, settlement type, and level of education were considered key socio-demographic characteristics. The sample primarily represents the Gen Z (18-27 years) and millennial (28-35 years) youth populations. For the survey, 400 respondents participated, with 235 male and 165 female. The age range was between 18 and 35 years, with 200 respondents from Generation Z (120 male and 80 female) and 200 from the millennial group (115 male and 85 female). Of the total respondents, 236 were from urban areas, while 164 were from rural areas.

Table: 2 Distribution of study population by Education

Education Level	Male	Female	Total	%
0-5 Primary	15	7	22	5.5
6-10 Secondary	46	27	73	18.25
11-12 Higher Secondary	57	40	97	24.25
12+ (Graduate)	117	91	208	52
Total	235	165	400	100

The educational variation in the sampled population was also recorded. Of the respondents, 5.5% had only primary education, 18.35% had completed secondary education, 24.25% had completed higher secondary education, and 52% had attained a graduate level of education. Additionally, 58.75% of respondents were male, while 41.25% were female. The data indicates a higher number of educated males across all educational categories.

Digital divide among Youth (Gen Z and Millennial) in Bangladesh

First-level digital divide (Source of Digital Devices)

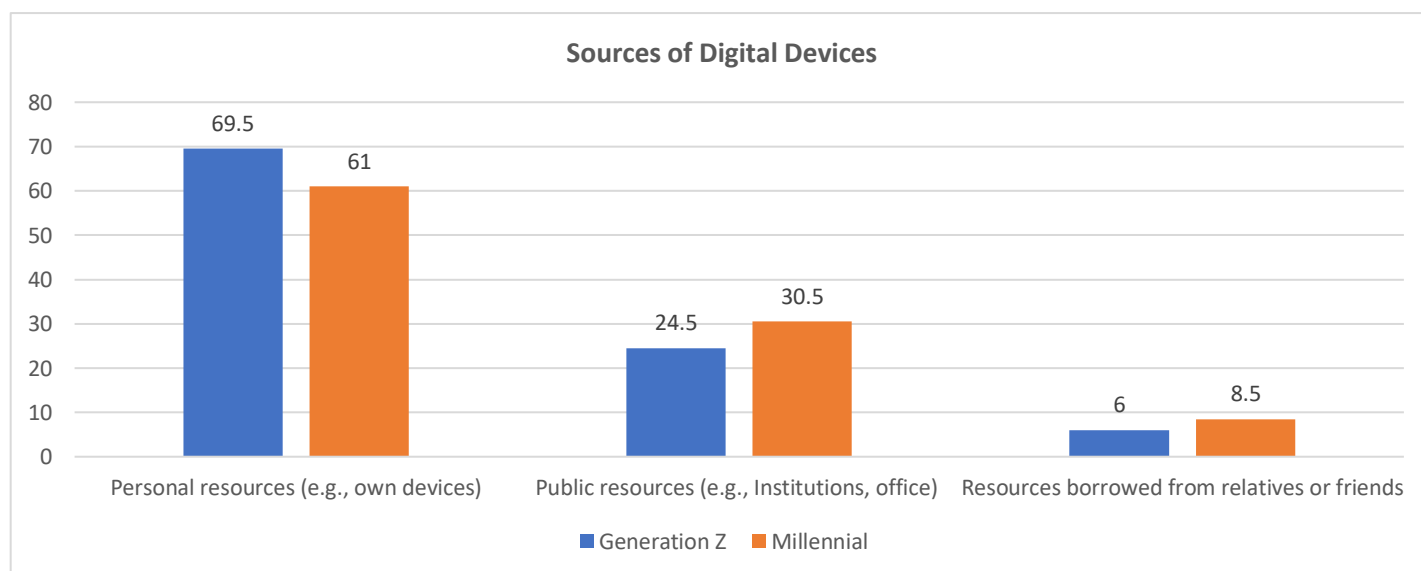


Figure 3: Sources of Digital Devices

The survey on the sources of digital devices reveals that 69.5% of Gen Z and 61% of millennials rely on their own personal devices. Additionally, 24.5% of Gen Z and 30.5% of millennials use public resources, while 6% of Gen Z and 8.5% of millennials borrow digital resources. Regarding internet access, 78% of Gen Z respondents have access (59% male and 41% female), while 71% of millennials do as well (67% male and 32% female).

The variables analysed—source of digital devices and internet access—serve as indicators of the initial level of the digital divide, which pertains to infrastructural accessibility to the digital realm. The findings suggest that youth in Bangladesh possess sufficient material access and demonstrate a high degree of self-sufficiency regarding device availability, exhibiting minimal dependence on borrowed resources. Both groups demonstrate overall adequate access to infrastructural resources, including internet connectivity. Millennial females exhibit

marginally reduced access levels. The findings indicate that the first-level digital divide is negligible for both groups of youth in Bangladesh.

However, the study also presents another picture- it highlights persistent digital disparities among youth in Bangladesh, extending beyond mere access. While digital devices are available and attitudes toward their use are positive, material accessibility varies significantly by region, education, geography, and gender.

Findings reveal that 30% of Gen Z lack personal digital resources—73% of them are in rural areas, and 79% are women. Among Millennials, 39% do not own devices and rely on public or shared resources; of these, 89% live in rural areas, and 79% are women. These insights underscore that the first-level digital divide is not just about access but is deeply shaped by structural barriers, with geography and gender playing critical roles in digital exclusion.

Second-level Digital divide (Operational, communication & information Skills, Strategic Skills)¹

The second-level digital divide (usage of digital access) between Generation Z and Millennial youth in Bangladesh was explored by focusing on three core skills: operational skills (such as scanning and printing files, installing software, browsing, saving documents, creating and using websites, proficiency in Microsoft Word, and proficiency in Microsoft PowerPoint), communication and information skills (such as using social media, making calls with digital tools, using AI tools, and sending emails), and strategic skills (such as blogging, digital content creation, content sharing, citizen journalism, and using social media for online campaigns). These skills were measured using a set of fixed indicators, as mentioned in the brackets alongside the skills.

The study used a binary scoring method (0,1) to assess the level of skills, with all indicators receiving equal weight. For example, if a respondent confirmed they could perform a task such as blogging, they received a score of "1"; if not, they received a score of "0." After counting all the indicators marked as chosen, the total scores were converted into percentages. Based on these percentages, skill levels were categorized as follows:

- $0 \leq \text{Low Skills} < 50$
- $50 \leq \text{Medium Skills} < 75$
- $75 \leq \text{High Skills} \leq 100$

Table 3: Second level digital divide explored as per generation and gender

Degree of the digital divide	Generation Z			Millennial		
	Male	Female	Total	Male	Female	Total
	%	%	%	%	%	%
Operational Skills						
Low	13	8	21	39	12.5	26.5
Medium	10.5	7	17.5	28.5	6.5	22
High	37.5	24	61.5	32.5	19	51.5
Information and Communication Skills						
Low	8.5	2.5	11	9	6.5	15.5
Medium	14	13	27	11	4.5	15.5
High	44.5	17.5	62	38.5	17	55.5
Strategic skills						
Low	20.5	11	31.5	22	14.5	36.5
Medium	13	6.5	19.5	16	9	25
High	23	13.5	36.5	26.5	12	38.5

¹ Due to the multiple response

Second level digital divide between Generation Z and Millennial youth: Operational Skills

The survey data reveals that Generation Z exhibits superior operational skills in navigating the digital divide, with 61.5% classified in the high-skills category, comprising 37.5% male and 25% female. In contrast, 51.5% of Millennials fall into this category, including 39% male. Millennials exhibit higher representation in medium (22%) and low (26.5%) skill levels compared to Generation Z, which has a presence of 17.5% in medium and 21% in low categories.

An examination of the gender dimension reveals that both Gen Z and Millennial males exhibit a greater propensity to fall into the low skills category, with rates of 13% and 39%, respectively. In the medium skills range, Gen Z males (10.5%) surpass females (7%), whereas the gap between Millennial males and females is significant (28.5% male, 6.5% female). In the high skill category, both Gen Z and millennial males outperform females, with millennial males exhibiting a higher skill level (32.5% males, 19% females).

From a gender perspective, males predominantly occupy high and medium skill levels, whereas females are under-represented. This indicates that Generation Z exhibits superior operational skills, whereas Millennials demonstrate relatively lower proficiency in this domain.

Second level digital divide between Generation Z and Millennial youth: Information and Communication Skills

The data indicates a significant second-level digital divide in Communication and Information skills among youth in Bangladesh, with Generation Z exhibiting higher proficiency (62%) compared to Millennials (55.5%). Generation Z exhibits a greater representation in the medium skill level at 27%, compared to 15.5% for Millennials. Conversely, Millennials demonstrate a higher presence in the low skill level, with 15.5% versus 11% for Generation Z. This indicates that Generation Z typically exhibits greater proficiency in Communication and Information skills, while Millennials encounter a wider skill gap, with a significant proportion demonstrating lower proficiency levels.

From a gender perspective, 11% of Gen Z are classified as having low skills, with males (8.5%) slightly outperforming females (2.5%). Among Millennials, 15.5% fall into the low-skilled category, with males (11%) significantly ahead of females (4.5%). In the "Medium" skills category, 27% of Generation Z are classified as medium-skilled (14% males, 13% females), whereas 15.5% of Millennials fall into this category (11% males, 4.5% females). Among "High" skills, 62% of Gen Z demonstrate high-level proficiency in information and communication skills, with males (44.5%) surpassing females (17.5%). In contrast, 55.5% of Millennials exhibit high skills, with males (38.5%) again outperforming females (17%).

From a generational comparison perspective, Gen Z demonstrates superior communication and information skills compared to Millennials, reflecting enhanced adaptability and education in the digital era. In this instance, Millennials are at a disadvantage compared to Gen Z, particularly in medium and high-skill categories. In addition to the generational perspective, there are notable gender disparities. Both generations demonstrate a persistent male advantage over females at all skill levels. Gender disparities are reduced among Gen Z for medium skill levels; however, they remain pronounced in the high-skill category.

Second level digital divide between Generation Z and Millennial Youth: Strategic Skills

The data illustrates the second-level digital divide regarding strategic skills among youth in Bangladesh. Generation Z demonstrates superior strategic digital skills, with 49% achieving a high level of proficiency, compared to only 38.5% of Millennials. Millennials exhibit higher representation in medium (25%) and low (36.5%) skill levels, in contrast to Generation Z, which shows 19.5% and 31.5%, respectively. The distribution indicates that Generation Z typically exhibits superior strategic digital skills, whereas Millennials encounter greater challenges, highlighting a wider skills gap within this demographic.

The digital divide in strategic skills by gender reveals that 20.5% of Generation Z are classified as low-skilled, with males (20.5%) outpacing females (11%). Within the Millennial demographic, 36.5% are categorized in this

group, with males comprising 22% and females 14.5%. Among individuals with medium-level skills, 27% of Generation Z demonstrate proficiency, with males at 14% and females at 13%. In comparison, merely 15.5% of Millennials are categorized in this manner, with males (11%) significantly surpassing females (4.5%). Among high-level skills, 62% of Generation Z meet this standard, with males at 44.5% surpassing females at 17.5%. Among Millennials, 38.5% achieve high-level proficiency, with males at 26.5% and females at 12%.

The findings regarding the second-level digital divide indicate that Generation Z demonstrates greater proficiency than Millennials across all skill categories. Generation Z exhibits superior operational and ICT skills, achieving high skill level scores of approximately 62%. In contrast, proficiency in strategic skills is somewhat less evident, as the percentage of individuals with a high skill level remains below 50%, yet still surpasses that of Millennials. The percentage of low skill levels is highest in the strategic skills category relative to other skill types. In conclusion, the second-level digital divide among the youth of Bangladesh is assessed to be at a low-to-medium level. From the responses, those who represent lower to medium skills, mostly women, and from rural, so beyond digital access gender and geographical factors strongly work.

Participatory Outcome of Politics between Gen Z and Millennials:

According to the Causal Model of Resources and the Appropriation Theory of the Digital Divide political outcome is considered as an indicator for measurement of the third-level digital divide. In this regard, Political engagements particularly civic participation, election turnout, and participation in political activism are important areas to measure for understanding the political outcome among the youth in Bangladesh.

Table 4: Participatory outcome (civic participation, election turnout, political activism) of the digital divide exploring the gender and generational dimension

Indicator	Generation Z				Millennial			
	Yes	Total %	Male %	Female %	Yes	Total %	Male %	Female %
Civic Participation								
Contact government official	107	53.5	38	15.5	103	51.5	40	11.5
Community work/social work	111	55.5	42	13.5	76	38	29	9
Community meetings	117	58.5	48	10.5	93	46.5	39.5	7
Volunteer work	129	64.5	27	37.5	91	45.5	28.5	17
Donation to charity	112	56	45	11	123	61.5	47.5	14
Organization membership	117	58.5	39	19.5	103	51.5	39.5	12
Protection against lawful, unethical activities	113	56.5	43	13.5	87	43.5	35	8.5
Election Turnout								
Local government election	111	55.5	29	26.5	109	54.5	28	26.5
National election	115	57.5	27	30.5	107	53.5	22	31.5
Political activism								
Persuade/ discourse others to vote	127	63.5	40.5	23	103	51.5	34.5	17
Attend speeches, rallies	115	57.5	36.5	21	86	43	31.5	11.5
Display campaign sign	137	68.5	41.5	27	79	39.5	26.5	13
Other work for a campaign	131	65.5	40.5	25	89	44.5	30	14.5
Donation to a campaign	98	49	27	22	107	53.5	36.5	17

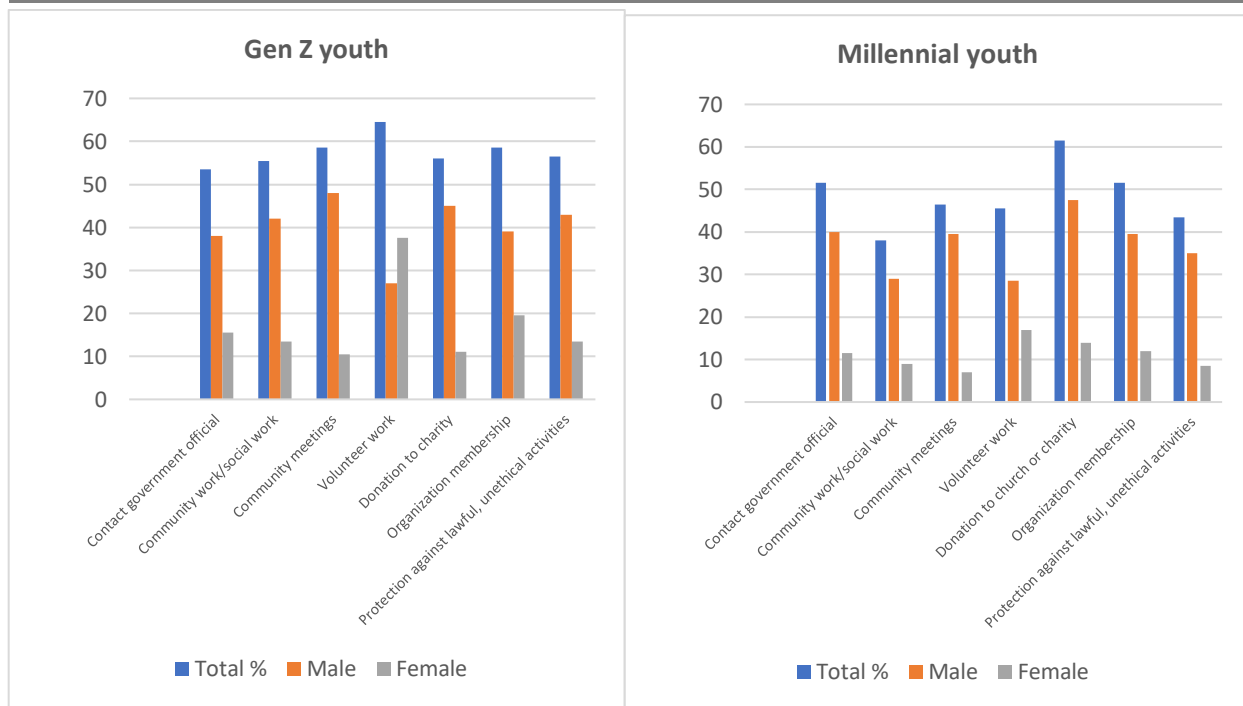


Figure 4: Participatory outcome of politics (Gen Z and Millennials): Civic Participation (Gender and Generational Perspectives)

The findings indicate that Generation Z engages more in civic and communal activities compared to Millennials. Generation Z exhibits higher participation rates in community work (55.5% compared to 38%), community meetings (58.5% versus 46.5%), and volunteer work (64.5% relative to 45.5%). There is a greater concern for safeguarding against lawful yet unethical behaviour, with 56.5% expressing this view compared to 43.5%. Both generations engage with government leaders and offices and participate in organizations at comparable rates, with Generation Z exhibiting a slight advantage over the other generation.

Millennials demonstrate a higher propensity to donate to charities, with 61.5% participating compared to 56% of Generation Z. This suggests that, although Millennials may emphasize charitable donations, Generation Z favours active participation in community and ethical initiatives, reflecting a greater dedication to direct engagement. Female Gen Z individuals exhibit increased involvement in volunteer activities, indicating that e-participation may facilitate more inclusive engagement in particular domains.

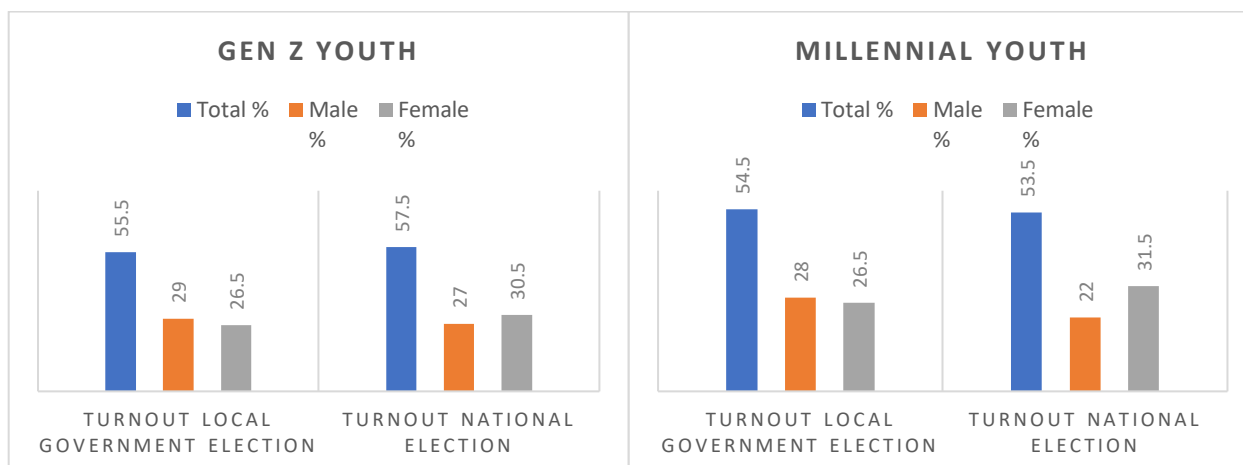


Figure 5: Participatory outcome of politics (Gen Z and Millennials): Election Turnout (Gender and Generational Perspectives)

This survey employs the term "turnout" to analyze the role of Generation Z and Millennial youth in local and national elections, distinguishing their participation from voting and engagement in anti-vote campaigns.

Generation Z exhibits a marginally greater voter turnout compared to Millennials in both local and national elections. Generation Z's voter turnout is 55.5%, comprising 29% of men and 26.5% of women participating in local elections, and 57.5% in national elections, with 27% of men and 30.5% of women. In comparison, Millennials exhibit a turnout of 54.5%, with 28% of men and 26.5% of women voting in local elections, and 53.5% in national elections, featuring 22% of men and 31.5% of women.

This indicates that Generation Z exhibits increased engagement in the electoral process, particularly at the national level, which may reflect a heightened interest in impacting wider policy issues. In national elections, it is anticipated that voter turnout among women will surpass that of men for both Gen Z and millennials, as indicated by the obtained percentages. Males exhibit greater activity in local elections than females, whereas females surpass males in national elections.

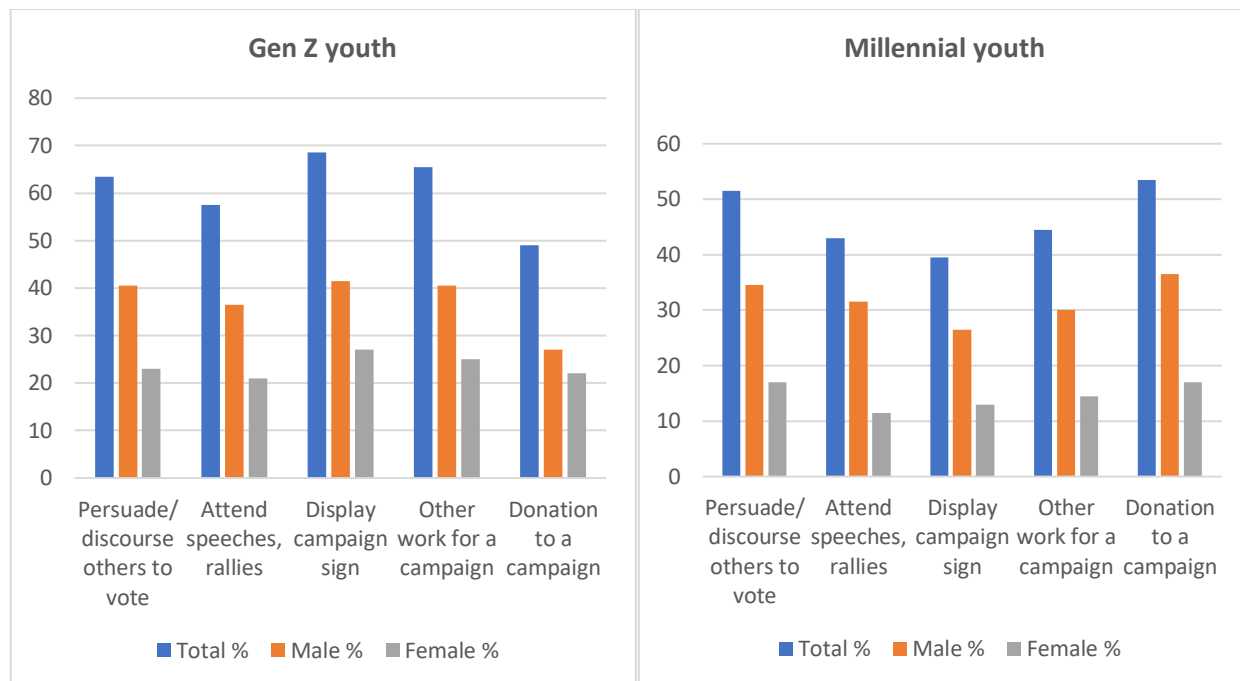


Figure 6: Participatory outcome of politics (Gen Z and Millennials): Political Activism (Gender and Generational Perspectives)

The survey data indicates a generational disparity in political engagement activities between Generation Z and Millennials. Generation Z demonstrates increased involvement in direct and observable political activities. For example, 63.5% of Generation Z individuals actively encourage others to vote, in contrast to 51.5% of Millennials. Generation Z exhibits a higher attendance rate at political events, such as rallies, at 57.5%, compared to Millennials, who have a rate of 43%. Generation Z demonstrates a notable propensity for public campaign support, with 68.5% exhibiting campaign signs, in contrast to 39.5% of Millennials. Additionally, 65.5% of Generation Z participate in other campaign activities, exceeding the 44.5% of Millennials.

Conversely, Millennials demonstrate a higher level of financial support for campaigns, with 53.5% contributing donations, in contrast to 49% of Generation Z. The survey reveals that Generation Z prefers active and visible engagement, whereas Millennials tend to provide support primarily through financial means.

Females are generally less engaged than males across both generations. Females from Gen Z exhibit greater engagement in political activism compared to their millennial counterparts across all dimensions. The data reveals significant gender disparities, with male participation exceeding female involvement in most categories of political activism, suggesting the need for improvements in promoting gender-balanced participation.

e-Participation and Participatory Outcome of Politics among Gen Z and Millennials

e-Participation denotes the utilization of electronic instruments to enhance public engagement in governmental rulemaking or decision-making (Singh, 2020). e-participation mitigates the resource constraints of time and

finances, facilitating wider access to political engagement. e-participation enables citizens to engage in political discourse, campaigns, and activism remotely, thereby significantly reducing obstacles. The informal yet pervasive aspect of social media has demonstrated significant efficacy in mobilizing broad participation and fostering discourse. This study therefore examines the relationship between e-participation and the three levels of the digital divide: access (first-level), skills (second-level), and outcomes of politics (third-level). It aims to understand how digital engagement affects political participation among Generation Z and Millennials in Bangladesh.

The results indicate that both Generation Z and Millennials in Bangladesh possess sufficient access to digital gadgets and the Internet. Generation Z has marginally superior operational, communicative, and strategic digital competencies compared to Millennials, indicating their enhanced capacity to utilize digital channels for political engagement.

Generational disparities in skill proficiency—where Gen Z excels in operational, communicative, and strategic digital competencies—indicate their greater inclination to use e-participation for attaining tangible and active political results. Millennials, however somewhat deficient in digital competencies, utilise e-participation proficiently for financial donations and indirect assistance. These disparities indicate a generational transition in the impact of digital tools on political engagement, with Gen Z adopting a more proactive and prominent role in civic and political affairs. Although Gen Z and Millennial youth in Bangladesh generally have sufficient access to digital platforms, those who face barriers such as geographical limitations, lack of education, financial constraints, or gender-based challenges are falling behind. These disparities negatively impact their ability to engage in e-participation in politics.

Generation Z is significantly engaged in civic activities, utilizing e-participation tools such as social media and digital platforms for community work (55.5%), meetings (58.5%), and volunteer initiatives (64.5%). These platforms are used for petitions and advocacy, fostering ethical conduct (56.5%), enhancing collaboration, and minimizing logistical obstacles. This practical engagement underscores their inclination for direct participation in communal and ethical projects, as demonstrated by the proliferation of diverse graffiti on walls, a consequence of community efforts post-July Revolution.

Millennials, albeit less engaged in direct civic involvement, predominantly utilise e-participation for monetary donations, with 61.5% contributing to charity via posts on digital platforms such as Facebook and Telegram groups, employing mobile finance services like Bkash, Nagad, and Rocket. They engage in civic discourse through internet forums, albeit less actively than Generation Z. Their engagement emphasizes indirect contributions, consistent with their tendency for supporting efforts through financial and informational resources rather than direct involvement. A possible explanation for this is that the majority of millennials have joined the workforce, resulting in more financial resources but diminished time relative to Gen Z.

E-participation significantly enhances voter awareness and turnout, particularly among Generation Z, with 55.5% participating in local elections and 57.5% in national elections. Digital voter education initiatives, internet notifications, and social media dialogues render information regarding candidates and voting procedures readily accessible. Peer influence on social media enhances engagement, fostering a feeling of community and collective accountability. Generation Z's political activity is overt and prominent, with 63.5% actively encouraging peers to vote, 57.5% organising rally participation, 68.5% exhibiting campaign support, and 65.5% engaging in campaign activities via social media. These platforms facilitate real-time communication, helping Gen Z to organise and engage more efficiently in political activities.

Millennials exhibit modest engagement in e-participation, with 54.5% participating in local elections and 53.5% in national elections. They depend on digital channels for candidate research and social media updates, however engage less actively than Gen Z, preferring conventional or passive modes of participation. Millennials favour financial and indirect action, with 53.5% participating in campaigns using electronic payment systems. They participate in discourse and advocacy via blogs, Facebook, WhatsApp, and X; nevertheless, their engagement is less conspicuous and more concentrated on indirect contributions, indicating a preference for subtler forms of activism.

As per the discussion above, the findings suggest that the first-level digital divide, related to access to devices and internet connectivity, is negligible among Bangladeshi youth. A significant proportion of respondents utilize personal devices, with 69.5% of Gen Z and 61% of Millennials indicating reliance on them. Additionally, internet access is notably prevalent, reported at 78% for Gen Z and 71% for Millennials. Disparities persist, as millennial women and rural youth exhibit lower access rates, indicative of ongoing infrastructural and affordability challenges. The findings support Van Deursen's (2013) model, highlighting that digital inclusion necessitates both physical access and the motivation to utilize digital tools effectively.

The second-level digital divide, which emphasizes digital skills, highlights disparities related to generation and gender. Generation Z demonstrates superior operational skills (61.5%), communication abilities (62%), and strategic competencies (49%) in comparison to Millennials, who score 51.5%, 55.5%, and 38.5%, respectively. Millennials, particularly women, tend to occupy low-skill categories, which restricts their capacity to utilize digital tools for political engagement. The results align with Park's (2014) classification of the second-level digital divide, indicating that although access gaps are decreasing, disparities in skills continue to affect participation.

At the third level, participatory outcomes vary according to generation and gender. Generation Z exhibits greater involvement in direct activism, with 63.5% persuading others to vote, 57.5% attending rallies, and 68.5% showing campaign support. In contrast, Millennials favor indirect participation, as evidenced by 53.5% contributing financially to campaigns. Generational differences correspond with Van Dijk's (2016) model, indicating that variations in access and skills directly influence individual engagement in political activities (third-level digital divide). That means the first and second-level digital divide have an impact on the third-level digital divide.

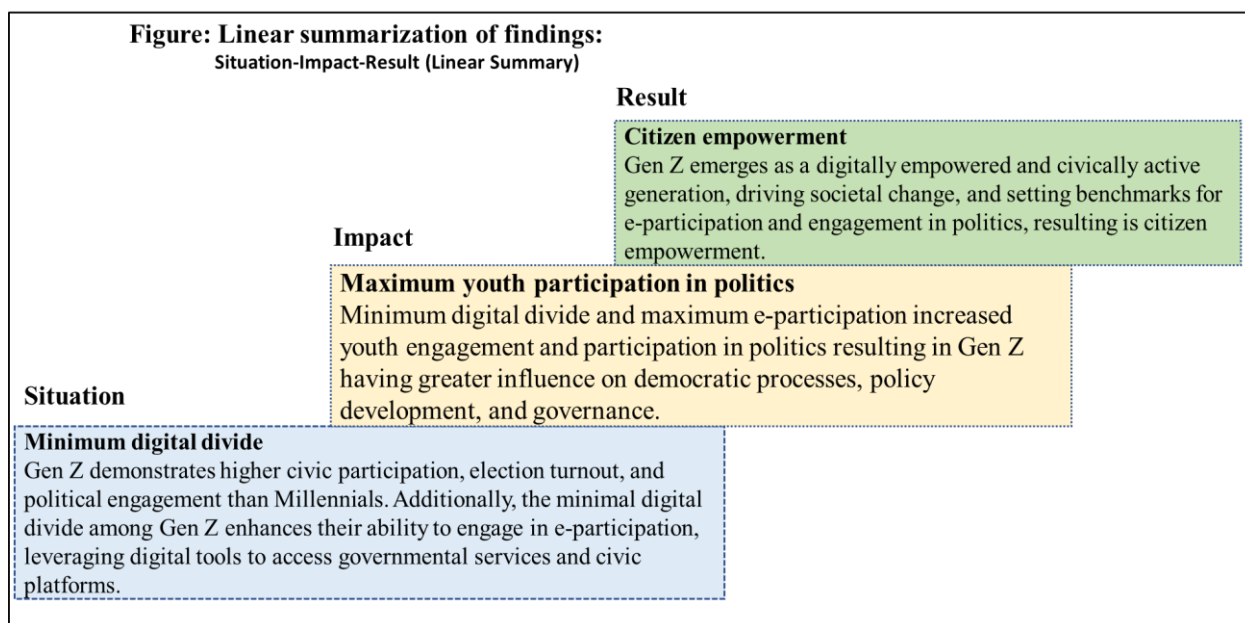


Figure 7: Linear summarization of findings

Digital access exists, yet barriers remain. Affordability, internet infrastructure, and digital literacy stand in the way of true political participation. Regional differences, such as rural vs. urban disparities, affect the study's results by highlighting lower digital access, weaker internet infrastructure, and greater digital skill gaps in rural areas, which limit e-participation and political engagement compared to urban youth. The high costs of devices and internet services create barriers for rural youth and lower-income Millennials, hindering their ability to engage consistently. In rural areas, the struggle with poor internet infrastructure leads to slow speeds and high data costs, hindering real-time political engagement. Gaps in digital literacy hinder effective participation, especially in strategic skills such as content creation and online activism. Gender disparities deepen these challenges, with women encountering lower skill levels and safety concerns online, which hinders their participation in digital political arenas. Barriers can obstruct political participation, limiting the effectiveness of digital tools meant to promote inclusive engagement, even when access exists.

RECOMMENDATIONS

The subsequent focused solutions are suggested to mitigate the digital divide and improve e-participation among Bangladeshi youth:

- Improve digital competencies among women. Foster secure digital environments to enhance active female involvement in e-participation and political engagement. Offer workshops that emphasise operational and strategic digital competencies for Millennial and Gen Z women to address their under-representation in high-skill sectors.
- Examine gender disparities in political activism. Develop initiatives aimed at increasing female involvement in political activism, especially among Millennials, where gender disparities are most evident.
- Utilise the digital proficiency of Gen Z to spearhead community-based digital literacy initiatives, promoting intergenerational learning to enhance the skillset of millennials.
- Comprehending the unique requirements and preferences of these generations is crucial for developing targeted interventions. Further research is required to explore areas not addressed in this study, including education level, region, ethnicity, and religion.
- Implement campaigns and revise the national educational curriculum to underscore the significance of civic engagement and political activism, customized to align with the preferences and strengths of each generation.

CONCLUSION

With clear distinctions between Generation Z and Millennials, the results of this study show the transforming power of e-participation in forming the political and civic engagement of Bangladeshi young. Emerging as digital natives who use social media and digital tools to mobilize, advocate, and participate in political processes, Generation Z welcomes visible and direct involvement. Their proactive participation in events including voting, lobbying, and volunteer work emphasizes their preparedness to lead society toward change. Their rather poor competency in strategic digital skills, however, points to a need for capacity development to fully exploit their possibilities.

By means of e-participation platforms for money donations and informational support, millennials, in contrast, prefer indirect participation. Although their participation is less obvious than that of Gen Z, their dependence on conventional techniques shows their realistic attitude in juggling civic engagement with professional obligations. However, the clear gender differences and ability gaps among Millennials indicate areas needing focused interventions to promote inclusivity and fair involvement.

The study emphasizes especially the need to tackle the digital gap in all its forms. Although Bangladeshi young have first-level divide access to gadgets and internet connectivity is generally sufficient, digital skill gaps—especially among women and Millennials—still exist. These differences affect the participative results of e-participation and thereby affect the degree of civic and political engagement among various groups.

More generally, the study emphasizes how e-participation may democratize access to political involvement and empower young people in underdeveloped nations like Bangladesh. From the July Revolution to daily advocacy, digital tools have been quite helpful in empowering young people to take agency and shared responsibility. To reach fair participation age, geographical, and gender inequalities must be addressed, digital infrastructure must be invested in, and cooperation among many groups must be promoted.

The narrative of e-participation among Gen Z and Millennials in Bangladesh is ultimately one of opportunity and challenge—a story of young empowerment moulded by technology, tempered by structural inequalities, and motivated by the promise of a more inclusive democratic future.

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