FINAL REPORT

CUSTOMER SURVEY OF THE DOMESTIC RETAIL MOBILE MARKET OF TRINIDAD AND TOBAGO

Submitted to:
Telecommunications Authority of Trinidad and Tobago

Submitted by:
Kairi Consultants Limited

July 2023

Final Report - Customer Survey of the Domestic Retail Mobile Market of Trinidad and Tobago

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July 2023

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ABBREVIATIONS

CSO	Central Statistical Office
ED	Enumeration District
MMS	Multimedia Messaging Service
MPI	Multidimensional Poverty Index
OTT	Over-the-Top
PSU	Primary Sampling Unit
SIM	Subscriber Identity Module
SMS	Short Message Service
USU	Ultimate Sampling unit

EXECUTIVE SUMMARY

The Telecommunications Authority of Trinidad and Tobago (the Authority) commissioned in July 2022, the design and conduct of a robust national probability sample survey among existing customers in the domestic retail mobile market in Trinidad and Tobago. The survey was designed to collect data on reported usage patterns, preferences, and choices with respect to the mobile services.

The data generated from the survey will be used by the Authority for assessing dominance in the domestic retail mobile market, a mandate encapsulated in the Telecommunications Act, Section 29 (8), which establishes that:

"…The Authority may determine that an operator or provider is dominant where, individually or jointly with others, it enjoys a position of economic strength affording it the power to behave to an appreciable extent independently of competitors, customers and ultimately consumers …"

The Authority's review of the relevant boundaries of the domestic retail mobile market of Trinidad and Tobago is premised on the following:

1. Global developments in technology which may likely hold the potential to affect the domestic mobile market in Trinidad and Tobago.

2. The overall significance of the mobile markets to the telecommunications sector's sustainability and the development of the national economy.

3. The core function of the Authority to promote investment in telecommunications and broadcasting services of Trinidad and Tobago.

4. The sustainable competition mandate and monitoring and evaluation function of the Authority.

5. Observed price trends in the domestic retail mobile market.

6. Observed changes in consumer usage patterns.

7. Potential impact of COVID–19 on telecommunication and broadcasting consumers.

Kairi Consultants Limited was contracted by the Authority to design and conduct the survey, and from the data generated, prepare a report that is delimited to the survey findings.

The study aimed to conduct a Consumer Survey in the Domestic Retail Mobile Market of Trinidad and Tobago using a cross-sectional design and probability sample methodology. The study focused on active consumers of mobile telecommunications services in the country. The sample design involved a two-stage stratified random probability methodology, with primary sampling units (enumeration districts) and ultimate sampling units (dwellings) systematically selected. The sample represented 0.073% of the population and covered 585 enumeration districts, 14 municipalities in Trinidad, and seven parishes in Tobago.

The study achieved a response rate of 96%, with 1,015 valid interviews completed out of 1,057 households visited. The survey refusal rate was 2%. The fieldwork was conducted from October to November 2022, and all analyses presented in the report were based on the 1,013 unweighted responses obtained. Weighting was applied to the survey data, resulting in 1,000 weighted responses.

The questionnaire used for the survey was developed in Survey Solutions and administered through computer-assisted personal interviewing (CAPI), ensuring data quality and eliminating the need for manual data entry. The questionnaire design focused on comprehensibility, logical sequencing, and the use of enabling conditions and validations.

A pilot survey was conducted to test the questionnaire's structure, wording, validity, logical sequencing, and other aspects. The pilot test identified minor adjustments and syntax enhancements to optimize the questionnaire design.

Field personnel underwent two training exercises, including an orientation exercise and comprehensive training covering survey objectives, key concepts, sampling procedures, fieldwork procedures, device management, quality control, workload allocation, and questionnaire review.

The fieldwork was executed by a team of 18 external resources, including a survey coordinator, two field supervisors, and 15 interviewers. The entire fieldwork was managed and monitored in real-time using the Survey Solutions system.

The study successfully implemented a cross-sectional consumer survey in the Domestic Retail Mobile Market of Trinidad and Tobago. The sample design and selection process, questionnaire design, pilot survey, training of field personnel, and fieldwork execution followed established methodologies. The study obtained a high response rate, contributing to the reliability and validity of the collected data.

The findings from this survey provide valuable insights into the domestic mobile market of Trinidad and Tobago, facilitating evidence-based decision-making for the telecommunications sector.

Table 1 gives details on the distribution of the responses to the action to be taken if the price of mobile calls were to increase, by monthly expenditure (voice, messaging and data).

Table 1. Action to be taken if the price of mobile calls were to increase, by monthly expenditure (voice, messaging and data)

Monthly Expenditure TT$	**Under $200**		**$200–$399**		**$400–$599**		**Above $600**		**Don't Know**		**Not Stated**	
Proposed Price Increase TT$	**$10**		**$10–$20**		**$20–$30**		**More Than $30**					
Action To Be Taken	**%**	**N**	**%**	**N**	**%**	**N**	**%**	**N**	**%**	**N**	**%**	**N**
Make fewer calls	27.6	165	16.4	16	10.9	2	32.3	1	0.0	0	0.0	0
Make fewer calls but use OTT calls (such as Viber, Skype, Google Voice, WhatsApp, or FaceTime) instead	32.9	197	30.7	30	33.4	6	0.0	0	0.0	0	0.0	0
Make fewer calls, but use OTT messaging (such as WhatsApp, iMessage or WeChat) instead	7.3	44	5.1	5	8.9	2	0.0	0	0.0	0	0.0	0
Stop using PAYG mobile calls	0.7	4	2.5	2	0.0	0	0.0	0	0.0	0	0.0	0
Switch to a mobile prepaid or postpaid plan	9.6	57	11.3	11	12.0	2	24.8	1	0.0	0	0.0	0
Do nothing (or pay the specific increase and continue as normal)	18.6	111	29.6	29	34.9	6	42.9	1	0.0	0	0.0	0
Don't know	3.2	19	4.4	4	0.0	0	0.0	0	0.0	0	0.0	0
Not stated	0.1	1	0.0	0	0.0	0	0.0	0	100.0	0	100.0	0
Total	**100.0**	**597**	**100.0**	**97**	**100.0**	**17**	**100.0**	**3**	**100.0**	**0**	**100.0**	**0**

Approximately 33% of respondents indicated that, in response to a $10 increase in subscription price, they would make fewer calls and use OTTs for calls instead. Respondents who chose to make fewer calls accounted for 27.9%, while 18.6% reported that they would do nothing in response to the price increase.

Approximately 31% of respondents indicated that, in response to a proposed $10 to $20 increase in their subscription price, they would make fewer calls, but use OTT calls, while 29.6% would do nothing, and 16.4% would make fewer calls.

In response to a proposed price increase of $20 to -$30, 34.9% of respondents reported that they would do nothing, while 33.4% reported that they would make fewer calls but use OTT calls instead.

Assuming a price increase of more than $30, 42.9% of respondents would do nothing, 32.3% would make fewer calls, and 24.8% would switch to a mobile prepaid or post-paid plan.

Table 2 presents the respondents' actions to be taken if the cost of SMS/MMS were to increase.

Table 2. Action to be taken if the cost of SMS/MMS were to increase

Monthly Expenditure TT$	**Under $200**		**$200-$399**		**$400-$599**		**Above $600**		**Don't Know**		**Not Stated**	
Proposed Cost Increase TT$	**$1**		**$2-$3**		**$3-$5**		**$5-$10**					
Action To Be Taken	**%**	N	**%**	N	**%**	N	**%**	N	**%**	N	**%**	N
Send fewer text messages (SMS messages)	23.7	116	11.4	7	11.8	1	0.0	0	0.0	0	0.0	0
Send fewer text messages (SMS messages) and use more OTT messaging	16.7	81	9.0	5	0.0	0	0.0	0	0.0	0	0.0	0
Stop sending text messages (SMS messages) altogether	4.7	23	1.7	1	0.0	0	48.2	1	0.0	0	0.0	0
Use OTT messaging only	28.6	139	53.2	32	72.8	5	0.0	0	0.0	0	0.0	0
Do nothing	23.1	112	24.7	15	15.4	1	51.8	1	0.0	0	0.0	0
Don't know	2.7	13	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0
Not stated	0.4	2	0.0	0	0.0	0	0.0	0	0.0	0	100.0	0
Total	**100.0**	**487**	**100.0**	**59**	**100.0**	**7**	**100.0**	**2**	**100.0**	**0**	**100.0**	**0**

Just over 28% of respondents indicated that, in response to a proposed $1 increase in the cost of SMS/MMS messages, they would use OTT messaging only; 23.7% said they would send fewer text messages; 23.1% would do nothing; and 16.7% would send fewer text messages and use more OTT messaging.

Another 53.2% of respondents indicated that they would use OTT messaging only in response to a proposed $2 to $3 increase in the cost of SMS/MMS messages. Approximately 24.7% said they would do nothing, and 11.4% would send fewer text messages.

With a proposed $3 to $5 increase, 72.8% of respondents stated they would use OTT messaging only; and 15.4% would do nothing.

Based on a proposed $5 to $10 increase in the cost of SMS/MMS, 51.8% of respondents said they would do nothing and 48.2% said they would stop sending text messages (SMS messages) altogether.

Table 3 provides data on the actions to be taken if the cost of mobile data were to increase.

Table 3. Action to be taken if the cost of mobile data were to increase

Monthly Expenditure TT$	**Under $200**		**$200-$399**		**$400-$599**		**Above $600**		**Don't Know**	
Proposed Cost Increase TT$	**$10**		**$10-$20**		**$20-$30**		**Above $30**			
Action To Be Taken	**%**	**N**	**%**	**N**	**%**	**N**	**%**	**N**	**%**	**N**
Stop using mobile data services altogether	12.2	11	10.0	4	7.3	1	32.3	1	0.0	0
Use less mobile data but stay on my current plan	5.3	5	17.6	8	0.0	0	0.0	0	0.0	0
Use less mobile data by offloading to Wi-Fi where possible	23.7	22	21.6	10	31.3	4	0.0	0	0.0	0
Switch to another mobile service offering	15.2	14	16.6	7	18.1	2	0.0	0	0.0	0
Use mobile call or SMS/MMS services on my current mobile plan	3.8	4	0.0	0	13.9	2	0.0	0	0.0	0
Do nothing	36.9	34	34.1	15	23.7	3	67.7	2	0.0	0
Don't know	1.7	2	0.0	0	5.6	1	0.0	0	0.0	0
Not stated	1.2	1	0.0	0	0.0	0	0.0	0	100.0	0
Total	**100.0**	**92**	**100.0**	**45**	**100.0**	**12**	**100.0**	**3**	**100.0**	**0**

With a proposed $10 cost increase for mobile data, 36.9% of respondents indicated that they would do nothing; 23.7% would use less mobile data by offloading to Wi-Fi where possible; 15.2% would switch to another mobile service offering; and 12.2% would stop using mobile data services altogether.

With respect to a proposed $10 to $20 increase, 34.1% of respondents stated they would do nothing; 21.6% would use less mobile data by offloading to Wi-Fi where possible; 17.6% would use less mobile data but stay on their current plan; and 16.6% would switch to another mobile service offering.

In response to a proposed $20 to $30 cost increase, 31.3% said they would use less mobile data by offloading to Wi-Fi where possible; 23.7% would do nothing; 18.1% would switch to another mobile service offering; and 13.9% would use mobile call or SMS/MMS services on their current mobile plan.

With a proposed cost increase of above $30, 67.7% of respondents stated they would do nothing, while 32.3% said they would stop using mobile data services altogether.

Table 4 presents the respondents' actions to be taken if the cost of their mobile plan/package increased.

Table 4. Actions to be taken if the cost of mobile plan/package increased

Monthly Expenditure TT$	**Under $200**		**$200-$399**		**$400-$599**		**Above $600**		**Don't Know**	
Proposed Cost Increase TT$	**$10**		**$10-$20**		**$20-$30**		**Above $30**			
Action To Be Taken	**%**	**N**	**%**	**N**	**%**	**N**	**%**	**N**	**%**	**N**
Make fewer mobile calls or stop making calls altogether	17.3	16	5.6	10	9.5	5	18.0	2	0.0	0
Send fewer SMS/MMS calls or stop sending SMS/MMS calls altogether	1.0	1	0.6	1	2.0	1	0.0	0	0.0	0
Use OTT call or messaging services instead	17.1	16	21.9	39	21.8	11	6.9	1	0.0	0
Use less mobile data or stop using mobile data altogether	7.0	7	1.3	2	1.4	1	0.0	0	0.0	0
Change to another plan or package	26.9	25	33.4	59	32.0	16	16.6	2	0.0	0
Stop using mobile services altogether	1.7	2	3.0	5	1.7	1	0.0	0	0.0	0
Do nothing	26.7	25	32.0	57	31.5	16	58.5	6	0.0	0
Don't know	2.2	22	2.1	4	0.0	0	0.0	0	0.0	0
Not stated	0.0	0	0.0	0	0.0	0	0.0	0	100.0	0
Total	**100.0**	**94**	**100.0**	**177**	**100.0**	**50**	**100.0**	**10**	**100.0**	**0**

With a proposed cost increase of $10 in the cost of their mobile plan/package, 26.9% of respondents indicated that they would switch to another plan or package; 26.7% would do nothing; 17.3% would make fewer mobile calls or stop making calls altogether; and 17.1% would use OTT call or messaging services instead.

In response to a proposed cost increase of $10 to $20, 33.4% of respondents would use OTT call or messaging services instead; 32% would do nothing; and 21.9% would use OTT call or messaging services instead.

With a proposed cost increase of $20 to $30, 32% indicated they would change to another plan or package; 31.5% said they would do nothing; and 21.8% would use OTT call or messaging services instead.

Nearly 59% of respondents reported that they would do nothing in response to a proposed increase above $30. A further 18% indicated that they would make fewer mobile calls or stop making calls altogether, while 16.6% would change to another plan or package.

Table 5 shows the actions to be taken by respondents if the cost of their MiFi (mobile data only) plan increased.

Table 5. Action taken if the cost of MiFi (mobile data only) plan increased

Monthly Expenditure TT$	**$100–$199**		**$200–$299**		**$300–$399**	
Proposed Price Increase TT$	**$5–$10**		**$10–$15**		**$15–$20**	
Action To Be Taken	**%**	**N**	**%**	**N**	**%**	**N**
Stop using MiFi mobile data service altogether	0.0	0	0.0	0	10.1	2
Switch to another mobile MiFi plan	0.0	0	0.0	0	0.0	0
Switch to accessing the Internet and emails via mobile data	47.1	1	35.9	4	45.6	8
Switch to or use a fixed Internet service	0.0	0	0.0	0	0.0	0
Do nothing	52.9	1	53.3	6	21.6	4
Don’t know	0.0	0	10.7	1	11.7	2
Not stated	0.0	0	0.0	0	11.0	2
Total	**100.0**	**2**	**100.0**	**11**	**100.0**	**18**

With a proposed price increase of $5 to $10, 52.9% of respondents would do nothing in reaction to the increase. A further 47.1% of respondents would switch to accessing the Internet and emails via mobile data.

With a proposed price increase of $10 to $15, 53.3% of respondents would do nothing, while 35.9% would switch to accessing the Internet and emails via mobile data. Approximately, 11% of respondents indicated that they did not know what their reaction would be.

In response to a proposed increase of $15 to $20, 45.6% of respondents indicated that they would switch to accessing the Internet and emails via mobile data; 21.6% would do nothing; and 10.1% would stop using MiFi mobile data service altogether. Respondents who did not know what action they would take or did not state any action accounted for 11.7% and 11%, respectively.

Figure 1 shows the data on switching vis-à-vis respondents and their mobile service providers in the preceding two years.

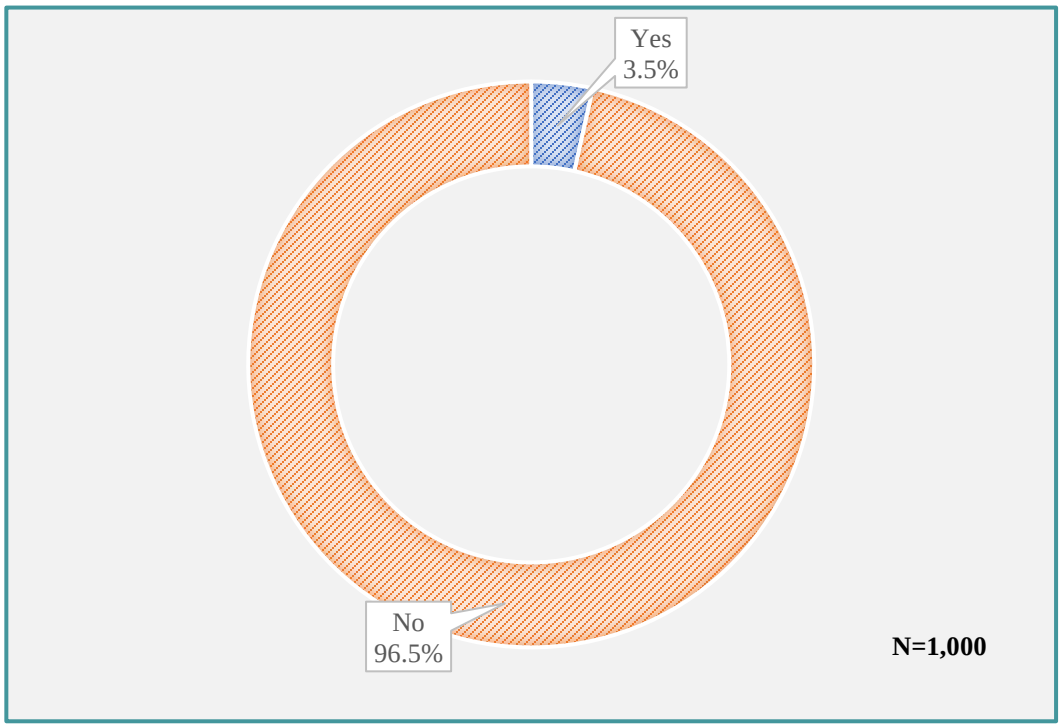


Figure 1. Respondents' switching mobile service providers in the previous two years

Approximately 97% of respondents indicated that they had not switched mobile service providers in the preceding two years, while 3.5% stated that they had switched.

Figure 2 illustrates the likelihood of respondents switching current mobile service providers in following one to two years.

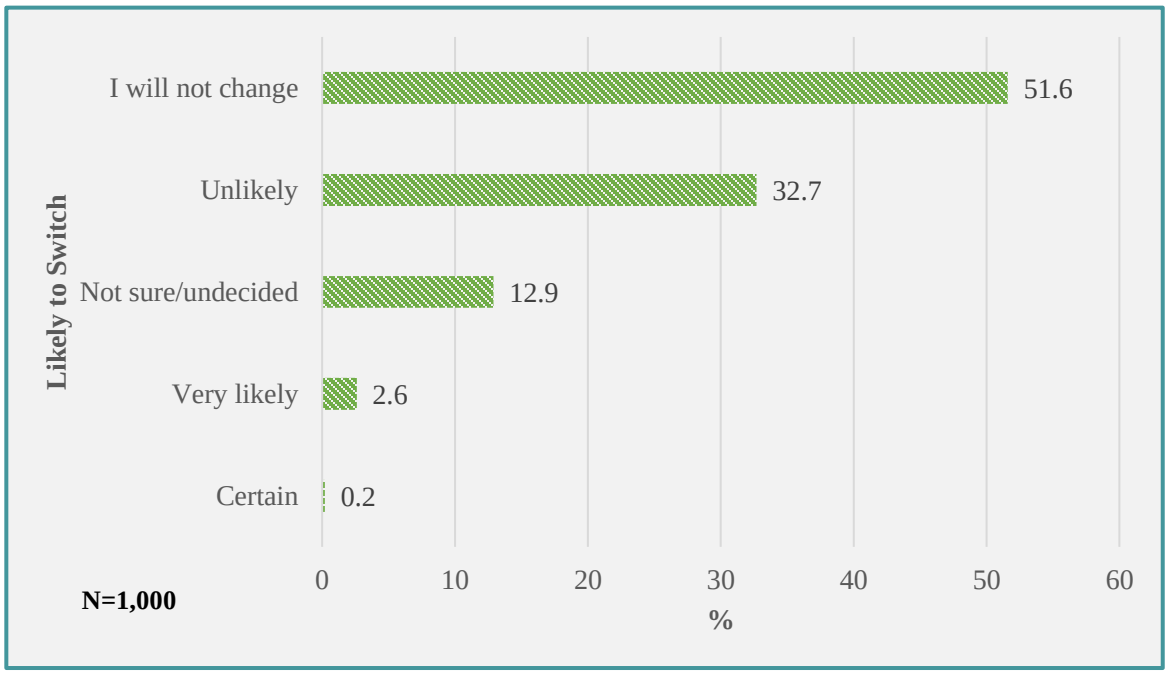


Figure 2. Likelihood of respondents switching from their current mobile service provider within one to two years

Just over half of respondents, 51.6%, indicated that they would not switch; 32.7% said they were unlikely to switch; 12.9% were not sure or undecided; 2.6% stated they were very unlikely to switch; and 0.2% were certain they would switch in the following one to two years.

Figure 3 shows the ranking, in three tiers, of the three most important factors in choosing a mobile service provider.

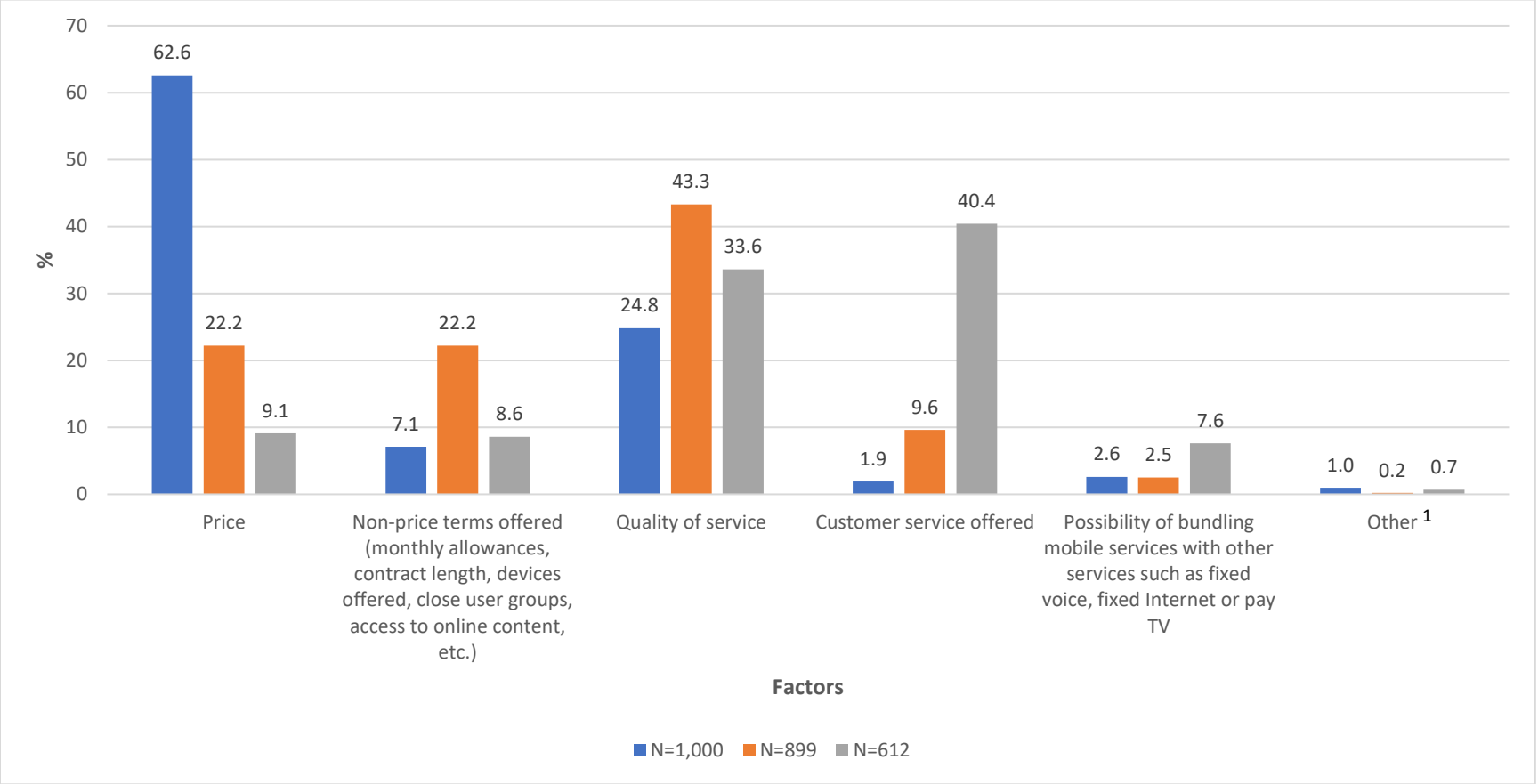


Figure 3. Ranking of three most important factors in choosing a mobile service provider

[1]*Other option responses.*

[1] Seventeen responses were provided in the "Other" category, which included company effectiveness and efficiency, number of subscribers on the provider's network, customer loyalty, the network used by the majority of my contacts, buying local, and the need for multiple SIM cards.

In the first ranked tier, 62.6% of respondents selected price, 24.8% chose quality of service, and 7.1% stated non-price terms offered, as the top three most important factors in choosing a mobile service provider.

In the second ranked tier, 43.3% of respondents cited quality of service, and 22.2% said both price and non-price terms, as the most important factors in choosing a mobile service provider.

With respect to the third ranked tier, customer service offered and quality of service accounted for 40.4% and 33.6%, respectively, and price accounted for 9.1%.

In terms of the second and third ranked factors, not all respondents provided factors for these tiers as requested, resulting in 899 responses in the second tier, and 612 in the third.

Figure 4 illustrates which service provider respondents would switch to if their current provider increased the cost of their mobile data usage.

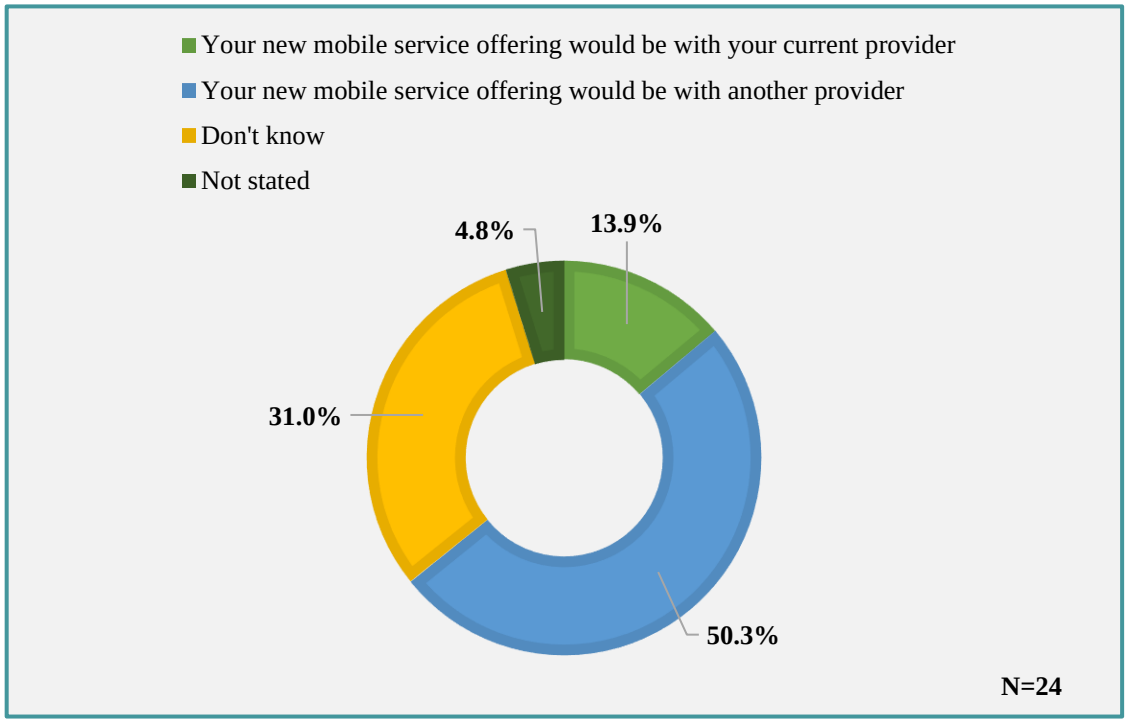


Figure 4. Which service provider respondents would switch to if their provider increased mobile data usage cost

Just over half of respondents, 50.3%, indicated that their new mobile service offering would be with another provider; 13.9% said their new mobile service offering would be with their current provider; 31.0% stated they did not know which provider they would switch to; and 4.8% did not say.

Figure 5 gives details on the purposes respondents cited for using OTT application(s) on mobile devices.

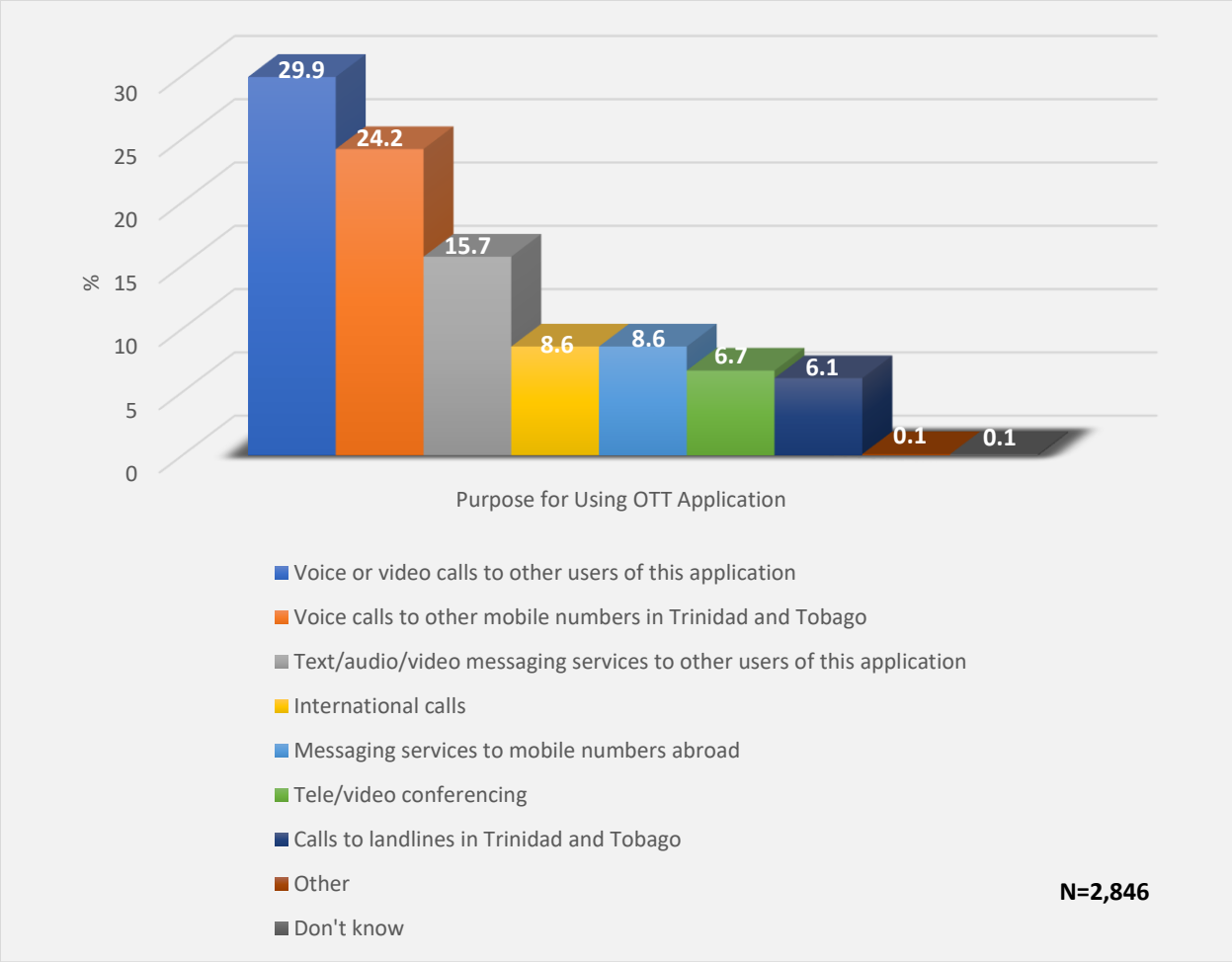


Figure 5. Purpose for using OTT application(s) on mobile devices (smartphone/tablet)

With respect to the purpose for using OTT application on their mobile device, a total of 29.9% of respondents indicated that they used OTT applications for voice or video calls to other users of the same application. A further 24.2% said they used OTT application for voice calls to other mobile numbers in Trinidad and Tobago, while 15.7% used the applications for text/audio/video messaging services to other users of the same applications.

International call and messaging services to mobile numbers abroad both accounted for 8.6% of responses, while tele/video conferencing and calls to landlines in Trinidad and Tobago accounted for 6.7% and 6.1% of responses. Respondents who identified other purposes, or did not know of any purpose, both accounted for 0.1% of all respondents.

Figure 6 presents data on the number of minutes spent weekly on domestic voice calls made using OTT application(s).

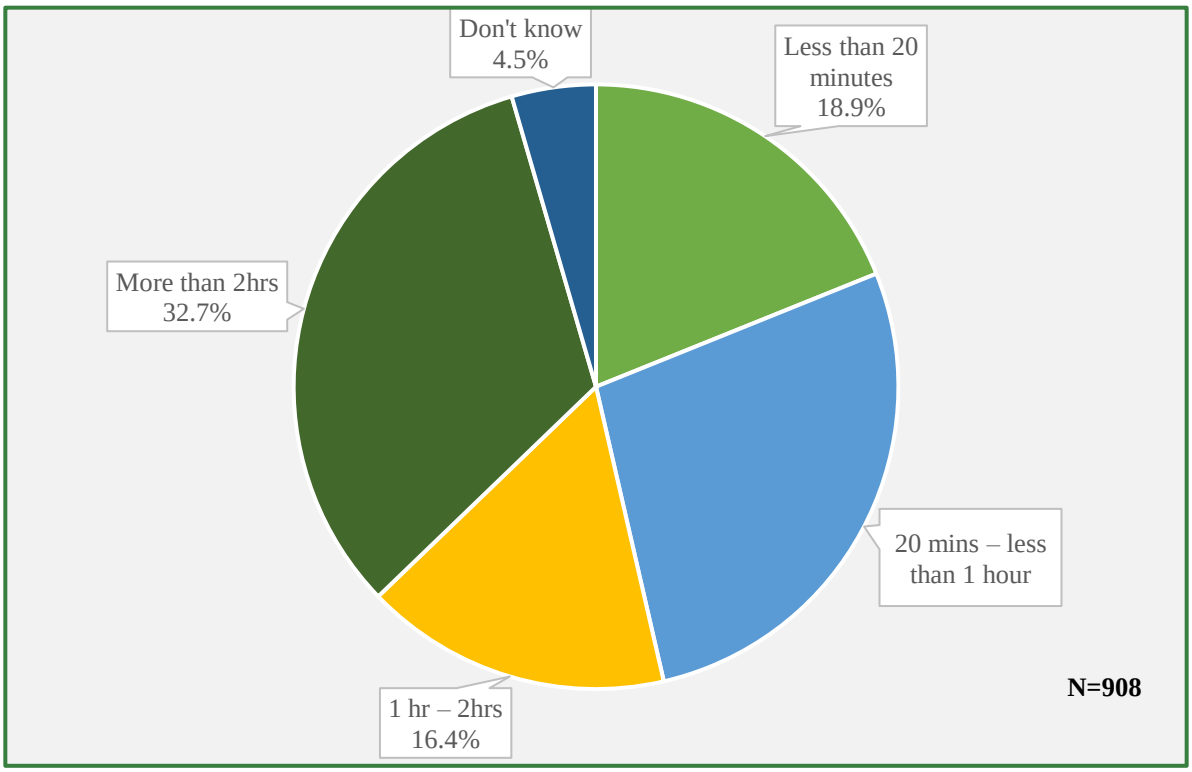


Figure 6. Number of minutes spent weekly on domestic voice calls made using OTT application(s)

When the 908 users of OTT applications were asked about the number of minutes spent weekly on domestic voice calls made using such applications, 32.7% of them indicated that they spent more than two hours; 27.5% spent 20 minutes to less than one hour; 18.9% spent less than 20 minutes; and 16.4% spent one to two hours. Approximately 5% of all respondents did not know how many minutes they spent.

Figure 7 depicts the number of OTT messages respondents received daily.

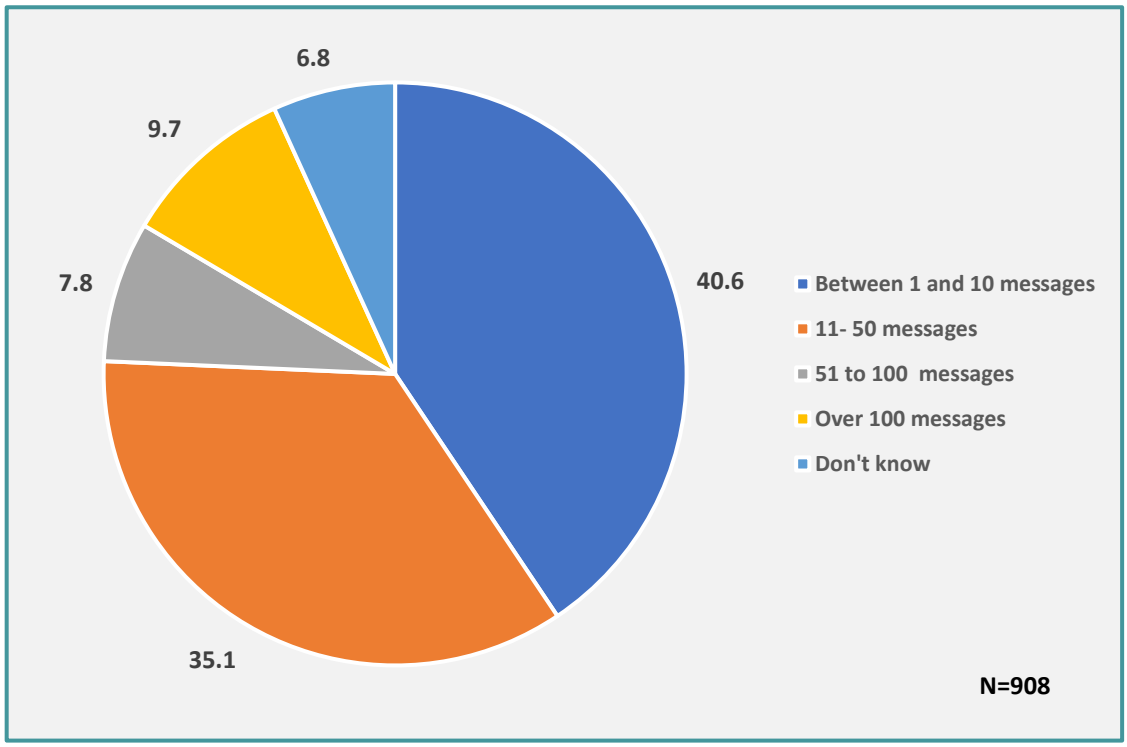


Figure 7. Number of OTT messages received daily

Close to 41% of respondents indicated that they received between 1 and 10 OTT messages daily; 35.1% said they received 11 to 50 OTT messages; 9.7% received over 100 messages; and 7.8% received 51 to 100. Approximately 7% of respondents did not know how many messages they received daily.

1 INTRODUCTION

1.1 Rationale

In October 2022, the Telecommunications Authority of Trinidad and Tobago (the Authority) conducted a national probability sample survey of customers in the domestic retail mobile market in Trinidad and Tobago. The survey was designed to collect data on reported usage patterns, preferences, and substitution with respect to mobile services. This *Report on the Customer Survey of the Domestic Retail Mobile Market of Trinidad and Tobago* (the Report) presents the results from the data generated from the survey.

This data will be used by the Authority for a myriad of competition studies or assessments including, inter alia, assessing dominance in the domestic retail mobile market; merger and acquisitions competitive impact; anticompetitive pricing tests and cross subsidisation effects, in accordance with the power enshrined in section 29 (8) of the Telecommunications Act, Chap. 47:31 (the Act), which establishes that:

> the Authority may determine that an operator or provider is dominant where, individually or jointly with others, it enjoys a position of economic strength affording it the power to behave to an appreciable extent independently of competitors, customers and ultimately consumers …

The Authority's determination of the relevant boundaries of the domestic retail mobile market of Trinidad and Tobago is an economic tool for competition management, the rationale for which is premised on the following:

1. Global developments in technology which hold the potential to affect domestic mobile and broadband markets in Trinidad and Tobago.

2. The overall significance of mobile markets to the telecommunications sector's sustainability and the development of the national economy.

3. The core function of the Authority to promote investment in telecommunications and broadcasting services in Trinidad and Tobago.

4. The sustainable competition mandate, and the monitoring and evaluation function of the Authority.

5. Observed price trends in the domestic retail mobile market.

6. Observed changes in consumer usage patterns.

7. The potential impact of COVID-19 on telecommunications and broadcasting consumers.

1.2 Background

The Authority is the statutory body empowered under the Act with the mandate to oversee the liberalisation and regulation of the domestic telecommunications and broadcasting sectors.

Amongst other things, the Authority is mandated to establish conditions to meet the following objectives:

1. Create an open market for telecommunications services, including conditions for fair competition.

2. Facilitate the orderly development of a telecommunications sector which serves to safeguard, enrich, and strengthen the national, social, cultural, and economic well-being of the society.

3. Promote universal access to telecommunications services.

4. Encourage investment in the sector.

5. Promote and protect the interests of consumers.

1.3 Domestic Retail Mobile Market

The domestic retail mobile market currently comprises the following two authorised providers of mobile services in Trinidad and Tobago:

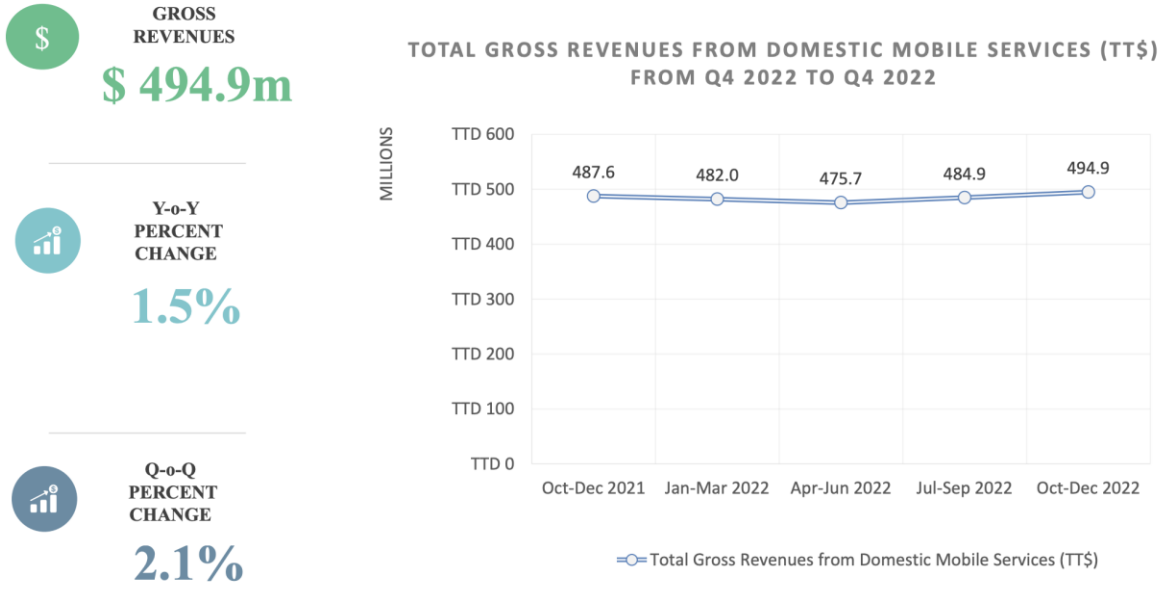
1. Digicel (Trinidad & Tobago) Limited (Digicel)

2. Telecommunications Services of Trinidad and Tobago Limited (TSTT)

These two operators have co-existed in the mobile market since 2006 when Digicel entered the market. They hold Type 2 Concessions, which are network-based permits that authorise both concessionaires to own or operate a public telecommunications network in addition to providing public telecommunications services.

According to the Authority's Quarterly Market Update, July to September 2022, total mobile service revenue for the third quarter 2021 to third quarter 2022 was estimated to be TT$494.9

million[2] when revenues from mobile voice and Internet services are combined, as seen in Figure 8.



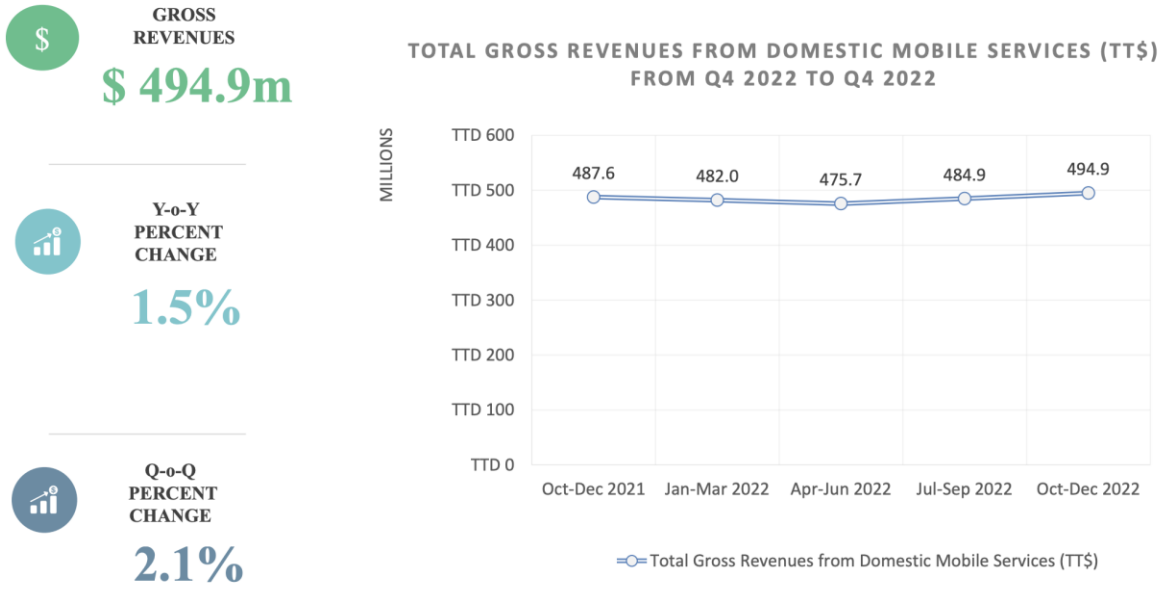


Figure 8. Mobile services revenues Q4 2021 to Q4 2022
Source: TATT QMR (2022)

[2] For the purposes of this report all references to money shall denote Trinidad and Tobago dollars (TT$)

2 METHODOLOGY

2.1 Study Design

The survey was developed as a cross-sectional study that was national in scope, using a probability sample methodology and the national sample frame used by the Central Statistical Office (CSO).

The unit of analysis for the proposed study was active[3] customers of mobile telecommunications services.

2.2 Sample Design and Selection

The survey was executed using a stratified random probability methodology based on clusters of dwelling units systematically selected in two stages.

The sample frame was stratified by municipalities in Trinidad and by parishes in Tobago. The primary sampling units (PSUs), that is, the enumeration districts (EDs), were chosen in the first stage, and the ultimate sampling units (USUs), of dwellings within the ED clusters, were selected in the second stage.

The PSUs were ranked within each municipality prior to random selection, using the Multidimensional Poverty Index (MPI)[4] that was developed using the data from the Trinidad and Tobago 2011 Population and Housing Census. Systematic sampling of these ranked PSUs ensured non-biased representation of PSUs in the sample for each municipality.

The sample for the survey represents 0.073% of the 1,367,558 population of Trinidad and Tobago (1,000 selections) and was drawn from the 585 EDs and 14 municipalities in Trinidad, and the seven parishes in Tobago. Trinidad's 14 independent geographic districts (or strata) comprised two cities (Port of Spain and San Fernando); three boroughs (Arima, Chaguanas, and Point Fortin); and nine regional corporations. Tobago's seven independent strata comprised seven parishes (Saint Andrew, Saint David, Saint George, Saint John, Saint Mary, Saint Patrick and Saint Paul).

Table 6 presents data on the distribution of the Census 2011 population and the number and proportion of unweighted responses obtained from the mobile consumer survey by administrative area.

The last two columns of the table show the total number of unweighted responses obtained from the survey sample and the unweighted distribution of the sample responses.

[3] "Active customers" are customers who reported using the service in the previous 30 days.

[4] Multidimensional Poverty Index is an index using several indicators of deprivation based on the methodology developed by the Oxford Poverty and Human Development Initiative.

Table 6. Distribution of population and mobile consumer sample distribution by municipality

Municipality	Census 2011		Domestic Retail Mobile Market Sample 2022	
	Population	Percent of Total Population	Unweighted Sample Responses	
	N	%	N	%
Trinidad	**1,267,163**	**95.4**	**963**	**95.1**
City of Port of Spain	37,074	2.8	40	3.9
Mayaro/Rio Claro	35,650	2.7	32	3.2
Sangre Grande	75,766	5.7	65	6.4
Princes Town	102,375	7.7	68	6.7
Penal/Debe	89,392	6.7	72	7.1
Siparia	86,949	6.5	56	5.5
City of San Fernando	48,838	3.7	32	3.2
Borough of Arima	33,606	2.5	31	3.1
Borough of Chaguanas	83,516	6.3	71	7.0
Borough of Point Fortin	20,253	1.5	14	1.4
Diego Martin	102,957	7.8	81	8.0
San Juan/Laventille	157,258	11.8	106	10.5
Tunapuna/Piarco	215,119	16.2	159	15.7
Couva/Tabaquite/Talparo	178,410	13.4	136	13.4
Tobago	**60,874**	**4.6**	**50**	**4.9**
Trinidad and Tobago	**1,328,037**	**100.0**	**1,013**	**100.0**

Note: The summation of individual percentages in columns may not appear to sum to precisely 100% due to rounding. Column percentages have been compiled using each figure expressed to the highest level of precision.

Table 7 depicts on the visitation status of households, by municipality, for the survey.

Table 7. Visitation status of households selected, by municipality

Municipality	1	2	3	4	5	6	7	8	9	10	11
	Completed Interviews	Partially Completed Interviews	Located, Asked to Return	Household Located, Nobody Present (Closed or Vacant)	Household Located, Contacted, Refused to Participate	Household Cannot Be Located Using the Identifying Information	Other	Total Interviews Attempted	Valid Interviews (1) + (2)	Response Rate (%) (8) / (9)	Refusal Rate (%) (5) / (8)
	N	N	N	N	N	N	N	N	N	%	%
Arima	30	1	0	2	1	0	0	34	31	91.2	2.9
Chaguanas	72	0	0	0	2	0	0	74	72	97.3	2.7
Couva/Tabaquite/Talparo	136	0	0	0	0	0	0	136	136	100.0	0.0
Diego Martin	81	0	0	1	1	0	3	86	81	94.2	1.2
Mayaro/Rio Claro	32	0	0	0	0	0	0	32	32	100.0	0.0
Penal/Debe	72	0	0	0	0	0	0	72	72	100.0	0.0
Point Fortin	14	0	0	1	0	1	0	16	14	87.5	0.0
Port of Spain	40	0	0	0	0	0	3	43	40	93.0	0.0
Princes Town	68	0	0	1	0	0	0	69	68	98.6	0.0
San Fernando	32	0	0	0	2	0	0	34	32	94.1	5.9
San Juan/Laventille	106	0	4	28	7	0	3	148	106	71.6	4.7
Sangre Grande	65	0	0	3	1	0	0	69	65	94.2	1.4
Siparia	56	0	0	2	0	0	0	58	56	96.6	0.0
Tunapuna/Piarco	160	0	0	18	7	0	1	186	160	86.0	3.8
Tobago	50	0	0	0	0	0	0	50	50	400	0.0
Total	**1,014**	**1**	**4**	**56**	**21**	**1**	**10**	**1,057**	**1,015**[5]	**96.0**	**2.0**

[5] Two of the 1,015 questionnaires administered had insufficient data to be used in the analysis and were removed from the data set.

Valid interviews, that is, completed and partially completed interviews, totaled 1,015, representing an overall survey response rate of 96% based on the total number of households visited during the survey (1,057). The survey refusal rate was 2%.

The fieldwork, conducted from October to November 2022, is the primary data source for information presented in the Report.

All analyses presented are based on the 1,013 unweighted responses (1,000 when weighted) to the questionnaire that was administered.

2.3 Weighting of Survey Data

Table 8 shows the weighted and unweighted sample distribution for the mobile consumer survey by municipality.

When sample weights are applied, the sample distribution for the survey sums to 1,000 respondents.

Table 8. Weighted and unweighted sample distribution for the mobile consumer survey by municipality

Municipality	Percent of Total Population	Unweighted		Weighted	
		N	%	N	%
Trinidad and Tobago	**95.4**	**963**	**95.1**	**954**	**95.4**
City of Port of Spain	2.8	40	3.9	28	2.8
Mayaro/Rio Claro	2.7	32	3.2	27	2.7
Sangre Grande	5.7	65	6.4	57	5.7
Princes Town	7.7	68	6.7	77	7.7
Penal/Debe	6.7	72	7.1	67	6.7
Siparia	6.5	56	5.5	65	6.5
City of San Fernando	3.7	32	3.2	37	3.7
Borough of Arima	2.5	31	3.1	25	2.5
Borough of Chaguanas	6.3	71	7.0	63	6.3
Borough of Point Fortin	1.5	14	1.4	15	1.5
Diego Martin	7.8	81	8.0	78	7.8
San Juan/Laventille	11.8	106	10.5	118	11.8
Tunapuna/Piarco	16.2	159	15.7	162	16.2
Couva/Tabaquite/Talparo	13.4	136	13.4	134	13.4
Tobago	**4.6**	**50**	**4.9**	**46**	**4.6**
Trinidad and Tobago	**100.0**[6]	**1,013**	**100.0**	**1,000**	**100.0**

[6] Note: The summation of individual percentages in columns may not appear to sum to precisely 100% due to rounding. Column percentages have been compiled using each figure expressed to the highest level of precision.

2.4 Survey Sample Error

Based on the 2011 Population and Housing Census estimate of 1,328,037 persons, total responses of 1,013 for the survey, and a 95% confidence level, the computed sample error or confidence interval is 3.08%. Based on the computed confidence interval, of 3, if 94% of respondents reported that they had subscribed to mobile call and messaging services, we can be relatively sure that the true estimate for the population lies between 91% (94-3) and 97% (94+3).

2.5 Questionnaire Design

The questionnaire used for the survey was developed based on the Authority's requirements. It was created in Survey Solutions, to be administered via computer-assisted personal interviewing (CAPI). This approach eliminated the need for manual data entry and contributed significantly to improving the overall quality of the data collected.

The design of the questionnaire incorporated appropriate use of enabling conditions[7] and validations[8], to ensure it would be administered in a logical manner and produce accurate data. This approach eliminated the need to perform extensive post-enumeration editing of the data as potential errors were identified and corrected during the interviewing process.

During the design process, special emphasis was placed on ensuring that the language used in the questionnaire was easily comprehensible to respondents and that proper examples were provided, where necessary, to assist in demystifying questions that were of a technical nature.

In designing the questionnaire, emphasis was first placed on structure and content and, in the later stages, on language, consistency of use of phrases, and logical and programming syntax.

A copy of the questionnaire is presented in Appendix I.

[7] An enabling condition is an expression that defines when a question must be asked, depending on the answers to other questions of the questionnaire. If no expression is specified, the question or section must be administered to all respondents.

[8] A validation rule is an expression that determines whether the answer to the question is valid, and it may be dependent on the answers to other questions in the questionnaire. If no validation rule is specified, any value that can be entered for this question type will be considered valid.

2.6 Pilot Survey

The pilot testing of the questionnaire formed an integral part of the questionnaire design process and was conducted with the following objectives:

1. Estimating the time taken to complete an interview.

2. Testing the structure and wording of questions to ensure validity (accuracy of measure)

3. Determining whether the questions were logically sequenced.

4. Identifying any additional/new responses to questions required

5. Ensuring that all interviewer instructions and definitions are clear to interviewers and respondents.

6. Testing all enabling conditions (skip logics) and data validation rules as well as identifying new validation requirements.

7. Testing whether the results of the pilot can be used for analysis, (i.e., preparation of the project report).

Overall, the pilot test was executed relatively smoothly and revealed some minor elements in the questionnaire to be adjusted, in addition to some basic syntax enhancements, to optimise the design of the questionnaire.

2.7 Training of Field Personnel

Two training exercises for field personnel were conducted during the project via Microsoft Teams. The first exercise was an orientation session designed to introduce the interviewing team and the supervisors to the questionnaire and to explain specific elements of the sample selection process, to facilitate them in conducting the pilot test exercise.

Guided by this exercise, team members were able to conduct a series of mock interviews prior to the conduct of the pilot survey, and seek additional explanations and clarification from the consultants, where necessary.

The second training activity was conducted immediately prior to the commencement of field interviews using the draft final version of the questionnaire. This activity focused on the following areas:

1. Objectives of the survey
2. Key concepts and definitions
3. Sampling procedures
4. Procedures for conducting fieldwork
5. Device (tablet) management
6. Quality control procedures
7. Workload allocation and time management
8. Detailed review of questionnaire

The Authority assisted with this training activity by providing information on the objectives of the survey and clarification with respect to specific terms and concepts used in the questionnaire, among other issues.

2.8 Conducting the Fieldwork

The fieldwork for the survey commenced on 3rd October 2022 and was completed on 11th November. While initially scheduled to be completed in one month, approximately eight days were lost during the period on account of torrential rainfall that resulted in flooding throughout both islands.

2.8.1 Team Organisation

The fieldwork was executed by a team of 18 persons – one survey coordinator, two field supervisors, and 15 interviewers. In addition to these personnel, two in-house supervisors (headquarters) were responsible for reviewing and accepting/rejecting each questionnaire that was submitted in Survey Solutions by the supervisors.

Each interviewer was assigned a workload of between 133 to 140 interviews and was required to complete his/her assignment over a duration of 30 days.

The entire field exercise was managed and monitored in real time in Survey Solutions.

2.8.2 Supervision of Fieldwork

The supervisors were responsible for planning and allocating workloads to their assigned team of interviewers, reviewing and approving/rejecting submitted interviews and, where necessary, contacting reluctant respondents and convincing them to participate in the survey. In some instances, a supervisor was required to conduct interviews.

Questionnaires that included comments entered by the interviewer, or those flagged as containing errors, were reviewed and returned to the interviewer for correction.

Supervisors were required to validate via telephone one in 20 completed interviews.

All work assignments accepted by supervisors were subject to further review by headquarters.

2.9 Data Processing

Data processing activities were performed using both STATA and SPSS. The former was the main program used to restructure the raw data generated from Survey Solutions and to compute the required variables, indices, and sub-indices. SPSS facilitated table generation and the execution of basic non-structural edits to individual variables during analysis.

3 MOBILE MARKET ANALYSIS

3.1 Demographics

Figure 9 illustrates the distribution of respondents by sex, with female as pink and male as blue.

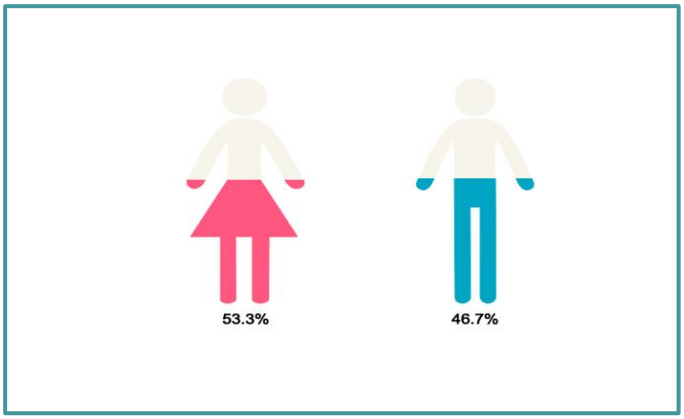


Figure 9. Distribution of respondents by sex

Of the 1,000 respondents, 53.3% were female and 46.7% were male.

Table 9 gives details on the distribution of respondents by age and sex.

Table 9. Distribution of respondents by age and sex

Age Cohorts	Males	Females	Both Sexes
	%		
18–24	8.8	5.3	7.1
25–28	6.1	6.7	6.4
30–34	7.9	9.9	8.9
35–39	10.1	8.9	9.5
40–44	9.6	9.9	9.8
45–49	7.7	9.0	8.3
50–54	10.5	8.8	9.7
55–59	9.9	8.4	9.2
60–64	9.6	12.0	10.8
65 and over	19.7	21.2	20.4
Total	**100.0**	**100.0**	**100.0**
N=1,000			

Approximately 20% of male respondents and 21% of female respondents were drawn from the 65 and over age category. In the 18 to 24 age cohort, 8.8% of respondents were males and 5.3% were females.

Figure 10 presents data on the distribution of respondents by relationship to the household head.

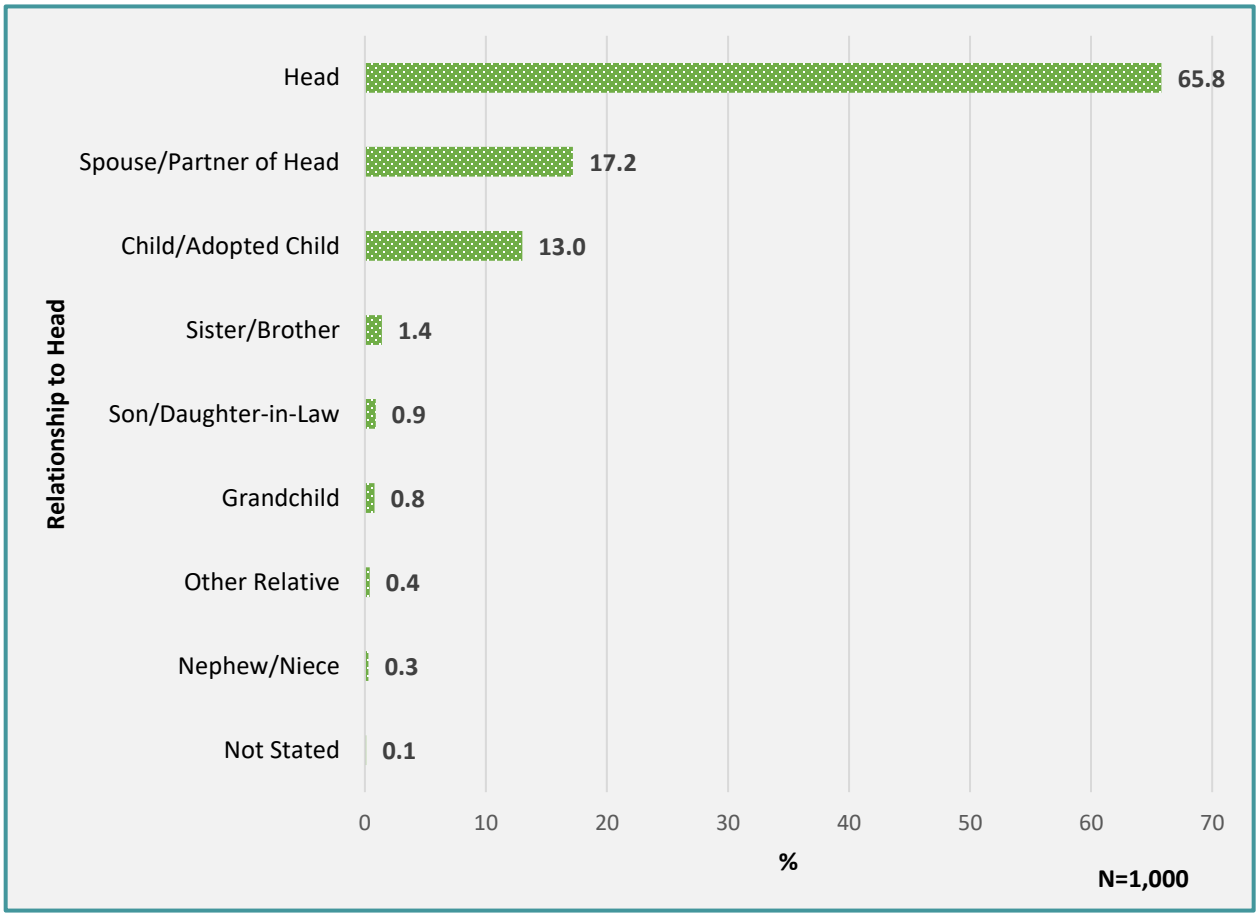


Figure 10. Distribution of respondents by relationship to household head

Of the 1,000 responses, 65.8% were heads of households. Spouses/partners of heads represented 17.2% of respondents, and child/adopted child of heads represented 13%. All other designations accounted for approximately 4%[9] of all respondents.

[9] This is the summed value of 1.4%, 0.9%, 0.8%, 0.4%, 0.3% and 0.1%.

Figure 11 shows the distribution of respondents by the highest level of education completed.

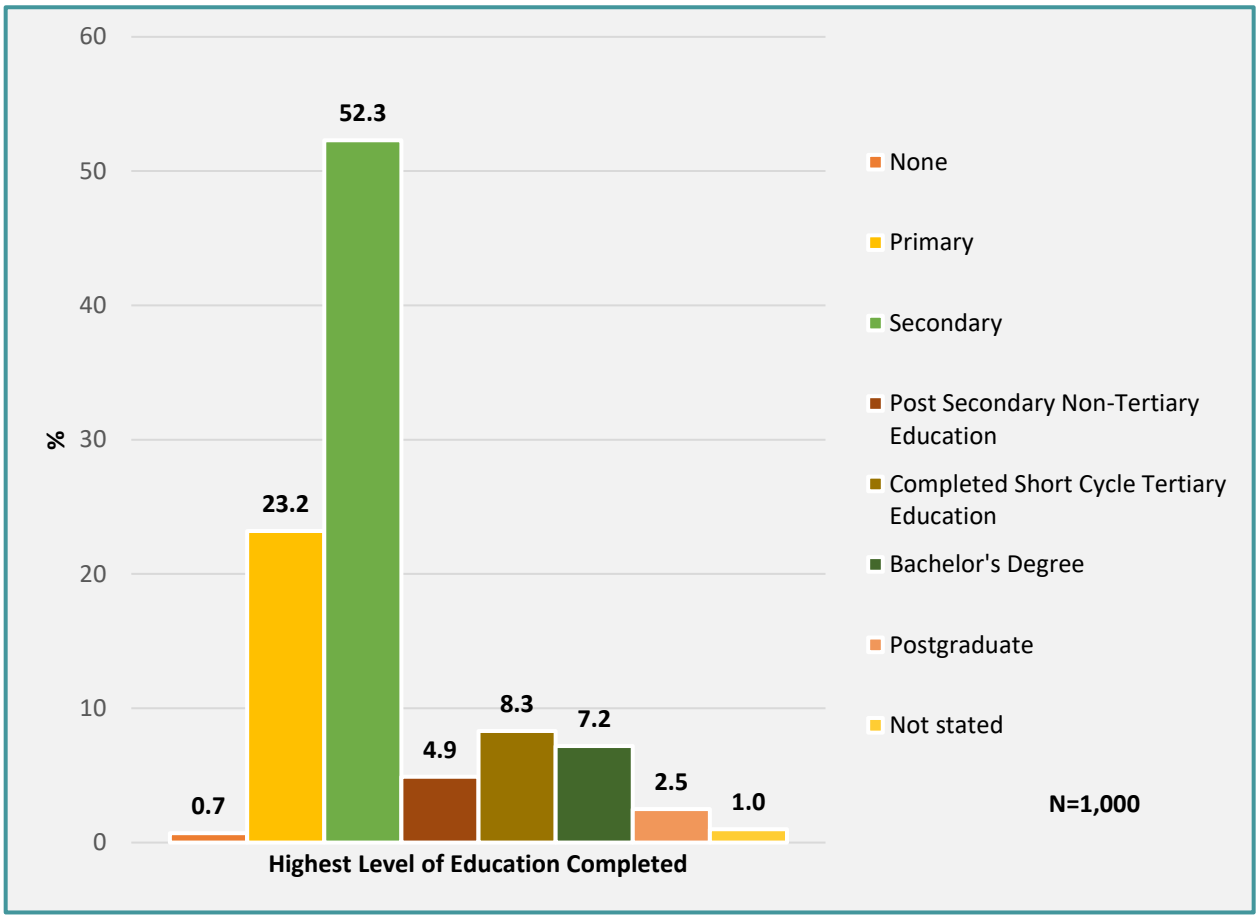


Figure 11. Distribution of respondents by highest level of education completed

Respondents who reported that secondary level education was the highest level of education they had completed had a representation of 52.3% in the sample. Approximately 23.2% of respondents reported that their highest level of education completed was primary school; 8.3% short-cycle tertiary education; 7.2% bachelor's degree; 4.9% post-secondary non-tertiary education; and 2.5% postgraduate level.

Figure 12 depicts the distribution of respondents by work status in the preceding week.

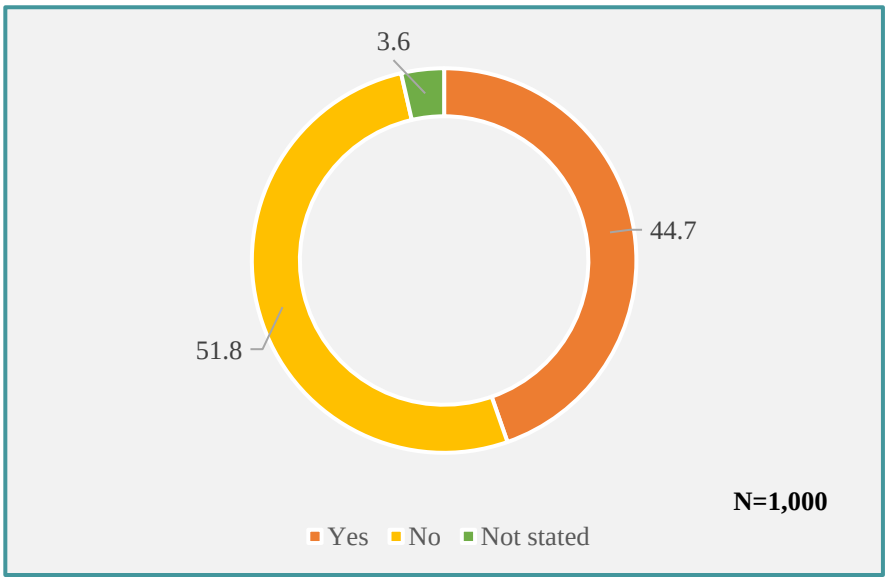


Figure 12. Distribution of respondents by work status in the preceding week

The data show that 44.7% of all respondents worked within the week prior to the date of their interview. Approximately 52% of respondents interviewed indicated that they had not worked in the week before, while the remainder, 3.6%, did not provide an answer when the question was asked.

It should be noted that the 51.8% of respondents who did not work in the week before the survey interview is not equivalent to the unemployment rate that is computed by the CSO, based on the Continuous Sample Survey of Population (CSSP) and its own definition of the unemployed[10]. Both figures should not be compared when conducting analyses.

[10] The CSO's definition of the unemployed states "The unemployed includes all persons who looked for work at some point in time during the three months' period preceding enumeration and who at the time of enumeration were not working or had a job, but still wanted to work." (n.d.). *Definition of Unemployment*. cso.gov.tt. Retrieved May 12, 2023, from https://cso.gov.tt/faq/what-is-the-definition-of-unemployed/#:~:text=The%20unemployed%20includes%20all%20persons,%E2%86%90%20Previous%20FAQ

Figure 13 presents the distribution of respondents by main occupational category.

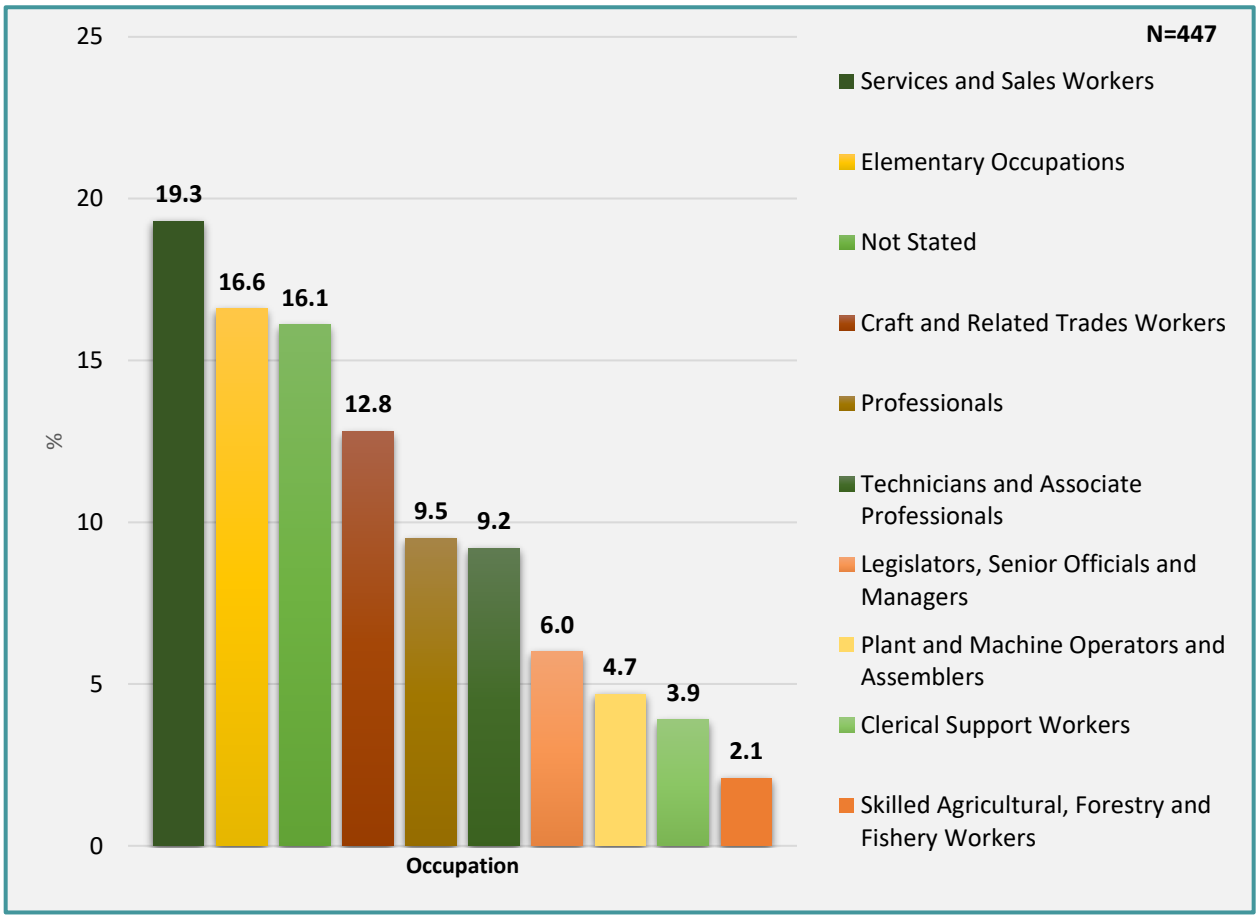


Figure 13. Distribution of respondents by main occupational category

The 447 respondents presented in the figure above are those who reported that they had worked in the last week in Figure 12.

Services and sales workers represented 19.3% of respondents, elementary occupations represented 16.6% while craft and related trades workers, professionals and technical and associate professionals were 12.8%, 9.5% and 9.2% respectively.

Other occupational categories with representation consisting of less than 5% of the responses were plant and machine operators and assemblers, with 4.7%; clerical support workers, with 3.9%; and skilled agricultural, forestry and fisheries workers, with 2.1%.

Figure 14 reflects the distribution of respondents by gross monthly income.

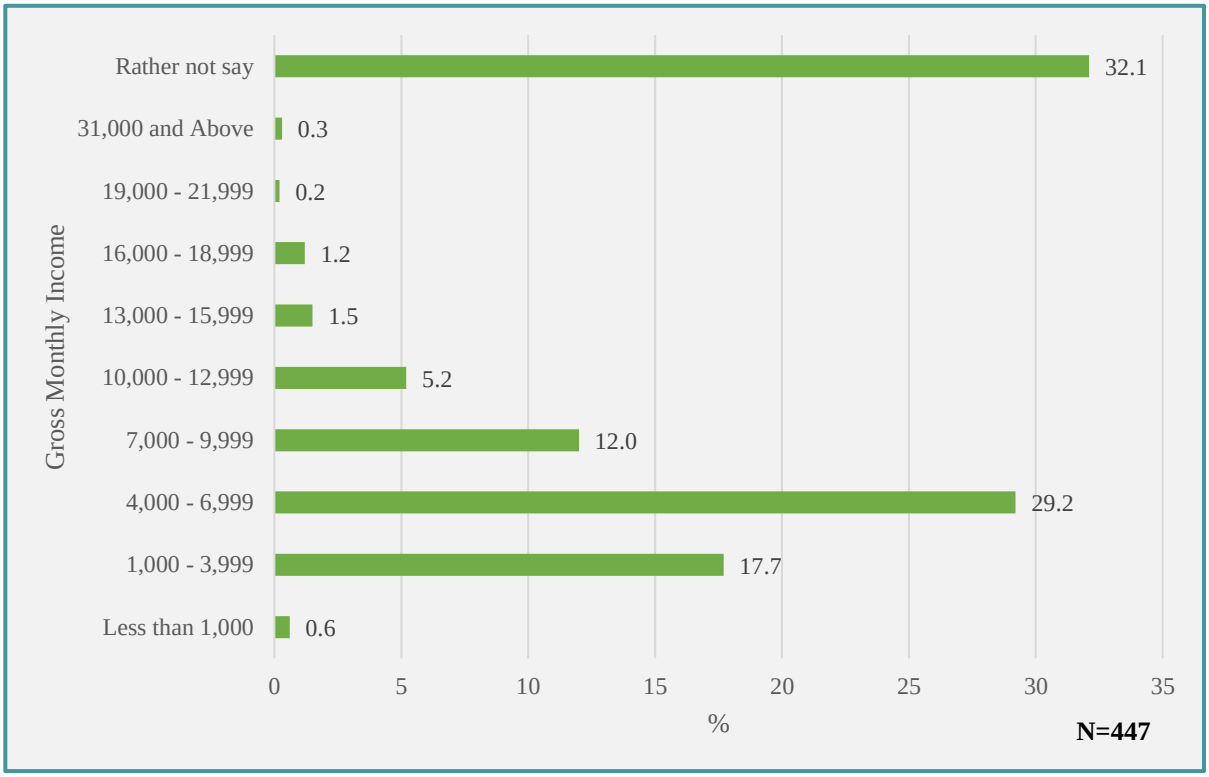


Figure 14. Distribution of respondents by gross monthly income

Of the 447 respondents who worked in the preceding week, 60.2%[11] were found to have a monthly income of less than $10,000 per month. Approximately 32% indicated that they would rather not say what was their gross monthly income. A further 7.9%[12] reported incomes above $10,000 but less than $19,000 per month. Only 0.5%[13] reported monthly incomes of $19,000 and above.

[11] This is the summed value of 12%, 29.2%, 17.7% and 0.6%.

[12] This is the summed value of 5.2% 1.5% and 1.2%.

[13] This is the summed value of 0.2% and 0.3%.

3.2 Demand For and Usage of Mobile Call, Messaging and Data Services

Table 10 lists the telecommunications services currently used.

Table 10. Telecommunications services currently used

Services Currently Used	N	Percentage of Cases
Mobile call and messaging services	942	94.1
Mobile data services as part of a smartphone plan	379	37.9
MiFi (mobile data only) services	32	3.2
Fixed Internet (access to the Internet only within your house)	799	79.9
Fixed landline call services	141	14.0

The number of respondents (N), presented for each type of telecommunications service currently used, represents the total number of households, out of the base of 1,000 respondents.

The responses show 94.1% using mobile call and messaging services; 79.9% fixed Internet services; and a further 37.9% using mobile data services as part of a smartphone plan. There was approximately 3% use of MiFi (mobile data only) services, and 14% use of fixed landline call services.

Figure 15 illustrates the number of subscriber identity module (SIM) cards used in the preceding 30 days.

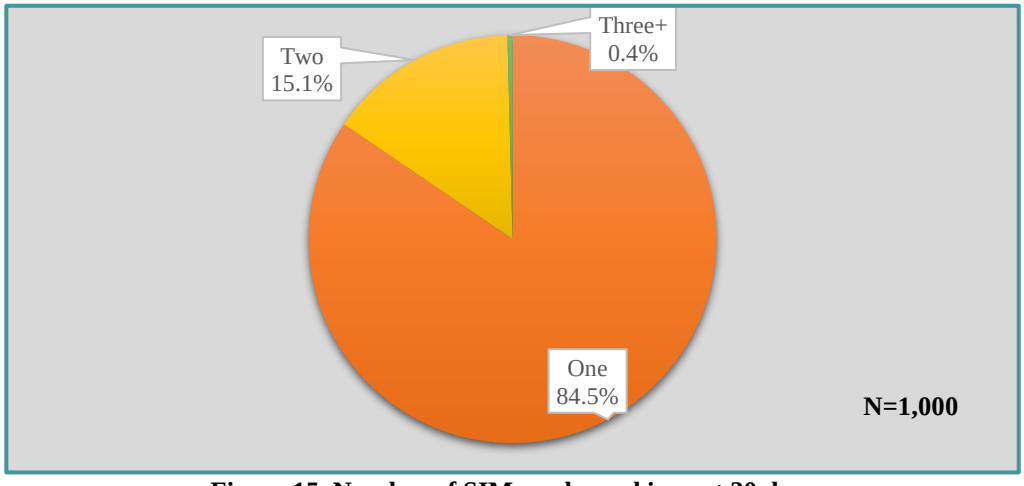


Figure 15. Number of SIM cards used in past 30 days

Of the 1,000 who responded to the question, 84.5% indicated that they used one SIM card; 15.1% reported that they used two cards; and 0.4% said that they used three or more cards.

Figure 16 shows the mobile providers for the SIM cards.

Figure 16. Mobile providers for the SIM cards

Figure 17 depicts the percentage of SIM cards installed in a smartphone or tablet that allows access to the Internet.

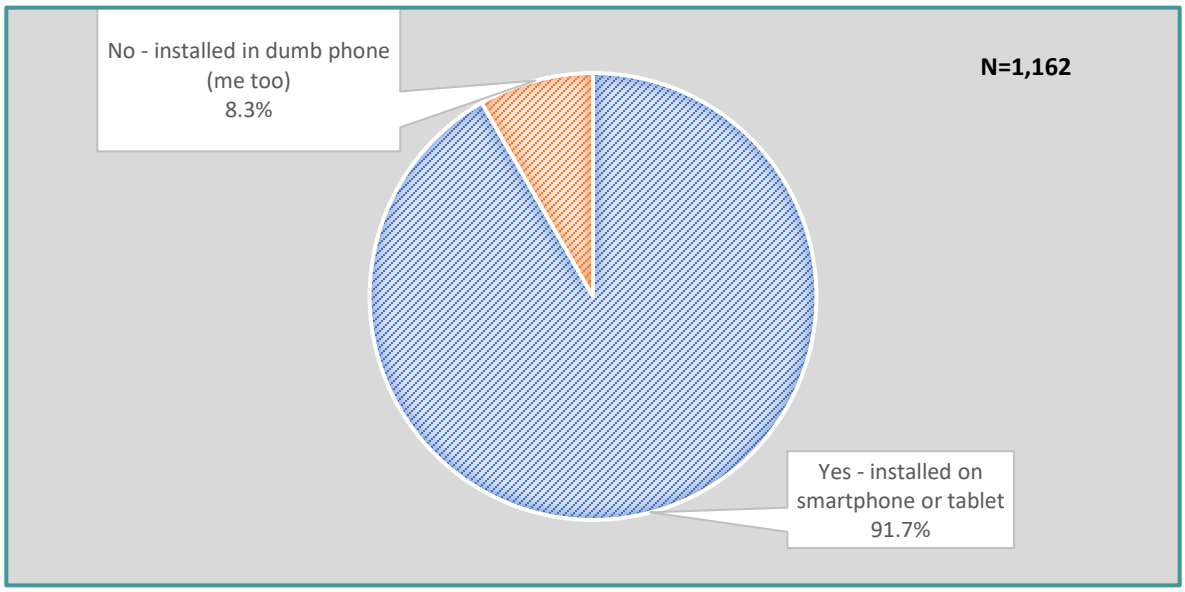


Figure 17. SIM card installed in a smartphone or tablet that allows access to the Internet

Respondents were asked whether their SIM card was installed in a smartphone or tablet that allows access to the Internet. Of the 1,162[14] responses received, 91.7% of SIM cards were installed on a smartphone or tablet and just over 8% were installed in "dumb phones."

[14] The N value is greater than 1,000 because some respondents reported having more than one SIM card.

Figure 18 presents data on the main service provider for mobile call and messaging-only services.

Figure 18. Main service provider for mobile call and messaging-only services

Table 11 lists the mobile plans currently subscribed to.

Table 11. Mobile plans currently subscribed to

Mobile Plans	N	%
Prepaid PAYG plans, i.e., you need to buy credit for your mobile phone calls or SMS via scratch cards, SMS or online	726	72.6
Prepaid daily/weekly/monthly plans, i.e., you purchase a mobile plan that includes calls, SMS/MMS, and data for a specific time period	209	20.9
Postpaid plans, i.e., you have a contract and pay a monthly subscription charge	127	12.7
Don't know	1	0.1
N=1,063[15]		

Prepaid pay as you go (PAYG) plans represented 72.6% of mobile plans currently subscribed to. Prepaid daily/weekly/monthly plans represented 20.9% of current mobile plan subscriptions, and postpaid plans represented 12.7%.

[15] The value of N exceeds 1,000 because several respondents reported subscribing to multiple plans.

Figure 19 details the ranking, in three tiers, of the top three most frequently purchased top up values.

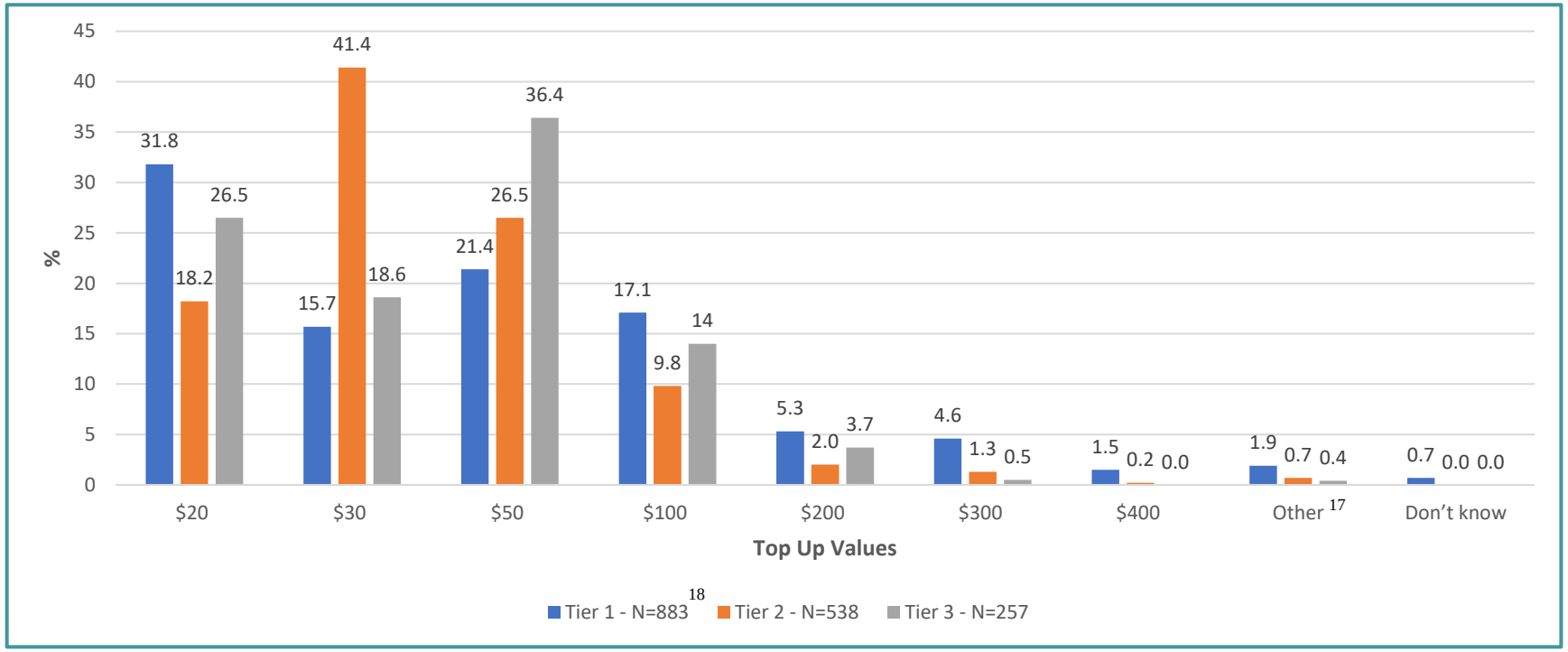


Figure 19. Ranking of top three most frequently purchased top up values

[16]*Other option responses.*

[17]*N value.*

[16] Twenty-two respondents provided responses to the "Other" category. Responses provided included 10, 40, 215, 225, 350, 450, 500, 600 and 700.

[17] This figure represents the total number of prepaid respondents comprising either prepaid PAYG plans or prepaid daily/weekly/monthly plans.

In the first ranked tier, which corresponds to the most frequently purchased top up values, 31.8% of respondents purchased the $20 value, 21.4% selected the $50 value, and 17.1% the $100 value.

In the second ranked tier, 41.4% of respondents purchased the $30 value, followed by 26.5% choosing the $50 value, and 18.2% purchasing the $20 value.

In the third ranked tier, the $50, $20 and $30 values were purchased by 36.4%, 26.5% and 18.6% of respondents, respectively.

In terms of the second and third most frequently purchased top up values, not all respondents provided values for these tiers as requested, resulting in 538 responses in the second tier and 257 in the third.

Figure 20 provides data on the amount spent monthly on mobile communication services (voice, messaging and data).

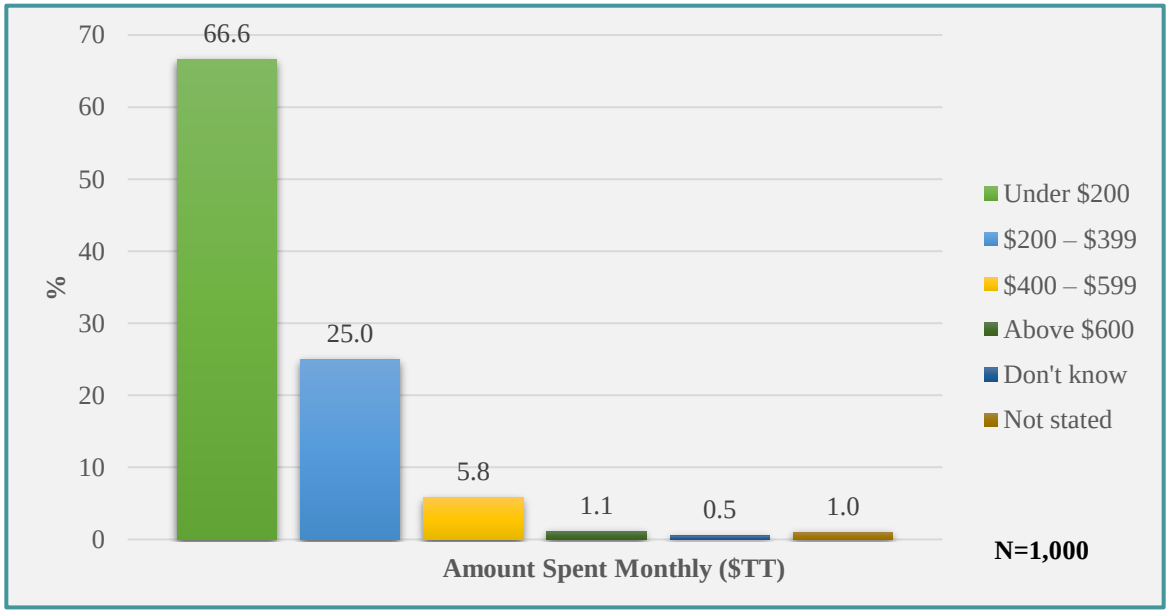


Figure 20. Amount spent monthly on mobile communication services (voice, messaging and data)

When asked about the amount spent monthly on mobile communication services (voice, messaging, and data), 66.6% of respondents reported that they spent under $200; 25% spent between $200 and $399; and 5.8% spent between $400 and $599.

Approximately 1.1% of respondents spent above $600, while 1.5%[18] either did not know or did not state the amount spent.

[18] This is the summed value of 0.5% and 1%.

Figure 21 illustrates the amount spent monthly on MiFi (mobile data only) services.

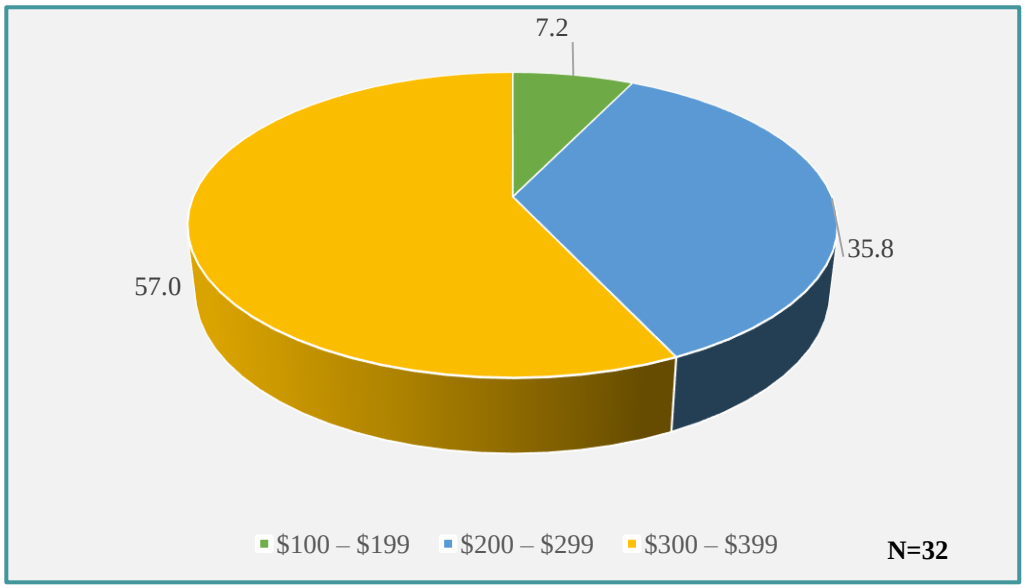


Figure 21. Distribution of amount spent monthly on MiFi (mobile data only) services

Thirty-two of the 1,000 survey respondents, or 3.2% of the sample, reported that they currently used MiFi (mobile data only) services.

In the highest price bracket of $300 to $399, 57% of respondents indicated they spent in this price range monthly on MiFi (mobile data only) services. Approximately 36% spent between $200 and $299 monthly, and 7.2% were in the $100 to $199 monthly range on MiFi (mobile data only) services.

Figure 22 presents the distribution in percentages of the responses regarding the purpose of mobile service usage.

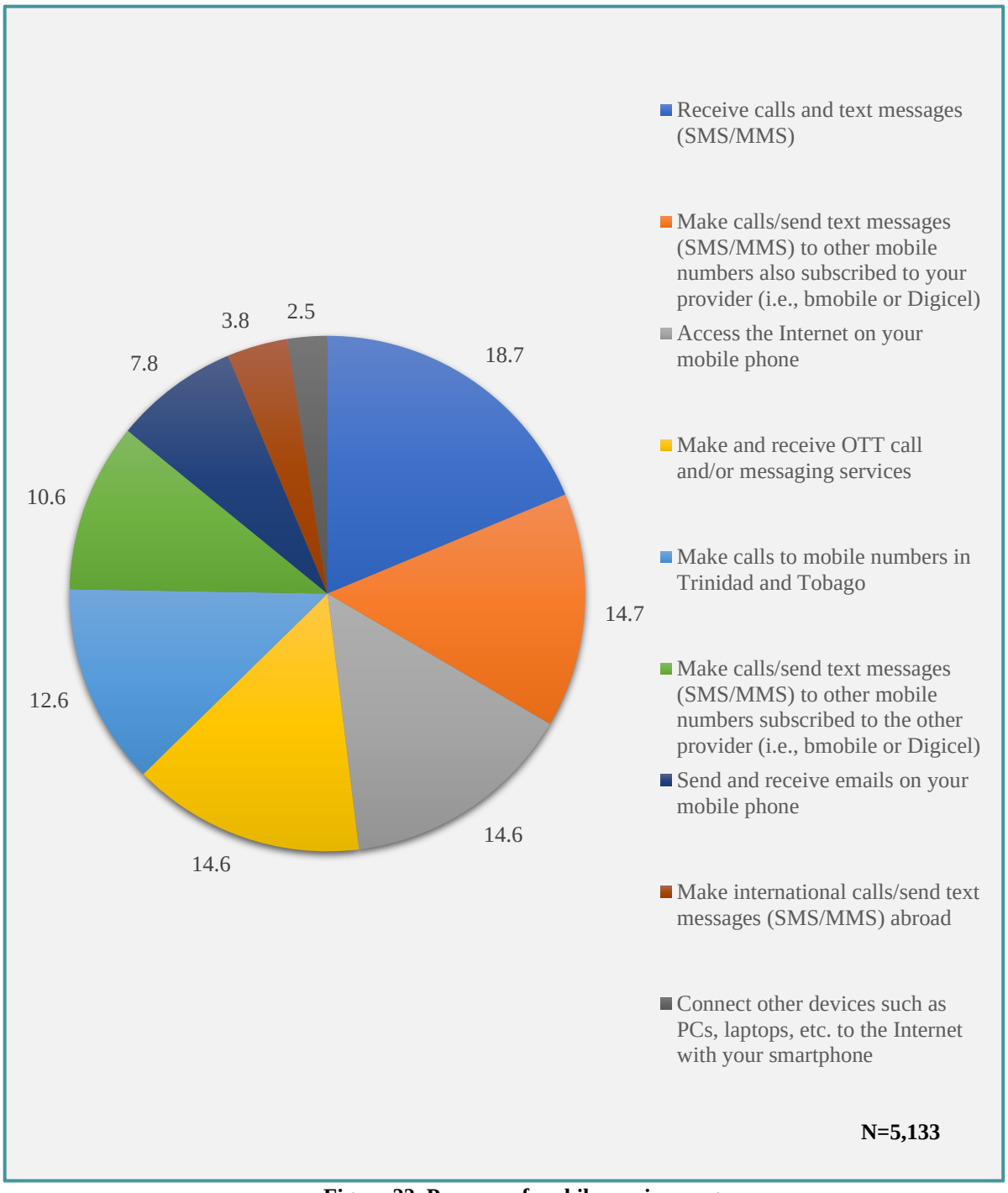


Figure 22. Purpose of mobile service usage

The 1,000 respondents, when asked about the purpose of mobile service usage, provided a total of 5,133 responses to the question. Respondents were allowed to select multiple purposes of mobile usage from a list of 10 pre-defined options provided, in addition to the option "not stated"[19].

The responses show 18.7% usage of the mobile service to receive calls and text messages; 14.7% for making calls and sending text messages; and 14.6% for accessing the Internet on a mobile phone or making or receiving OTT calls and/or messages.

Other reported usage included making calls to mobile numbers in Trinidad and Tobago; making calls/sending text messages to other mobile numbers subscribed to the other provider; or sending and receiving emails on your mobile phone, which accounted for 12.6%, 10.6% and 7.8%, respectively.

Making international calls/sending text messages abroad accounted for 3.8% of usage.

Figure 23 shows the percentages of the responses regarding the uses of MiFi (mobile data only) services.

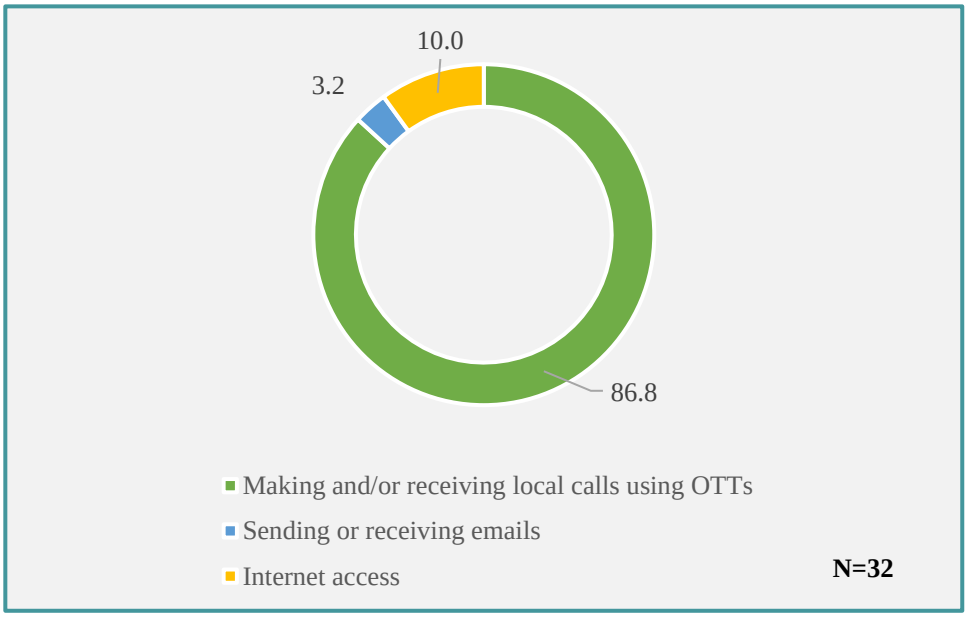


Figure 23. Uses of MiFi (mobile data only) services

Of the 32 respondents, 86.8% indicated that they use the services when making and/or receiving local calls using OTT applications. Ten per cent reported that they use the service to access the Internet, and 3.2% said they used MiFi services for sending or receiving emails.

[19] No responses were obtained for Not stated.

Figure 24 depicts the distribution of responses on the number of minutes spent on voice calls made each week using a mobile phone.

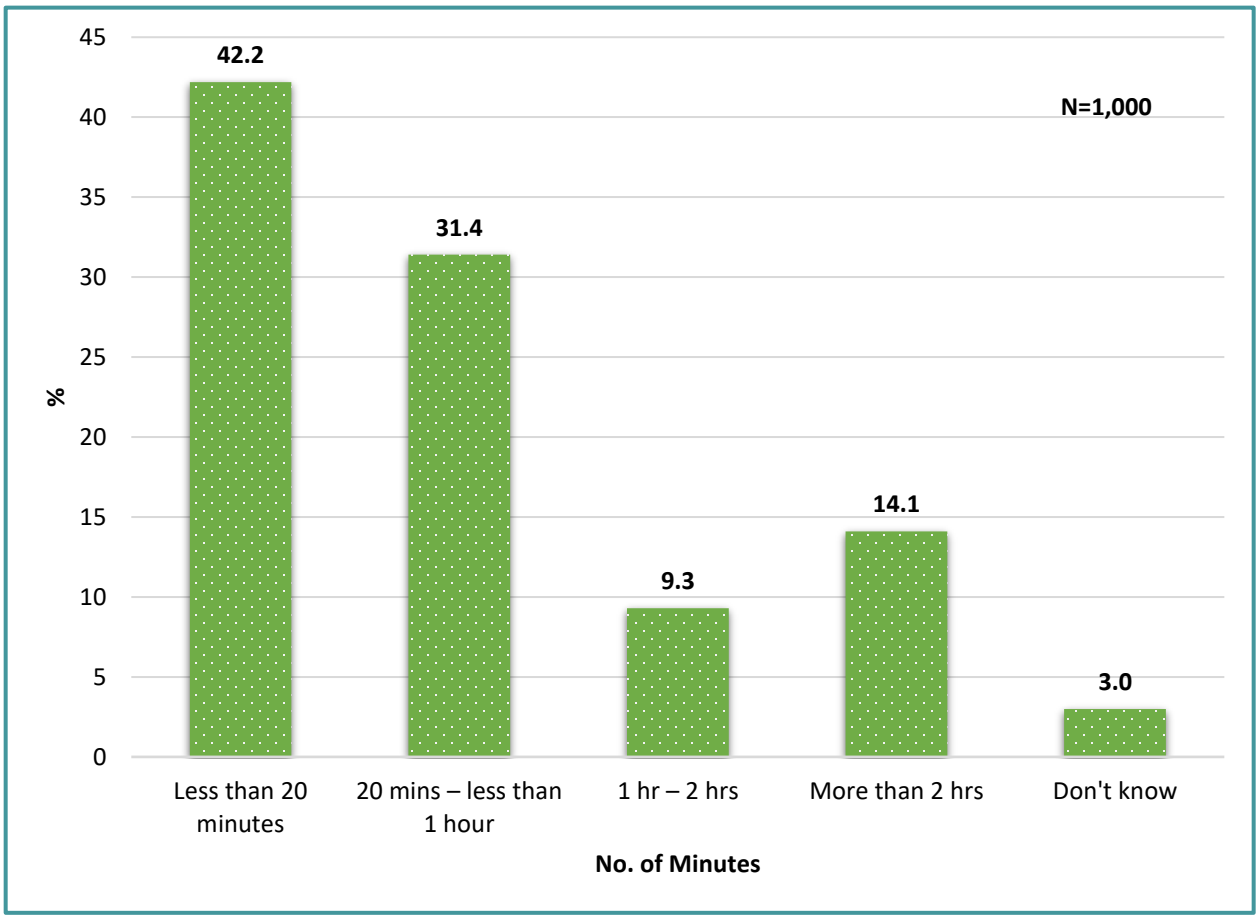


Figure 24. Number of minutes spent on voice calls made each week using a mobile phone

Approximately 42% of respondents indicated that they spent less than 20 minutes on voice calls made using their mobile phone each week. The "20 minutes to less than an hour" category accounted for 31.4% of respondents, while 14.1% spent more than two hours, and 9.3% spent one to two hours. Respondents who did not know accounted for 3% of the 1,000 respondents.

Figure 25 presents data on the number of text messages (SMS/MMS) sent each week.

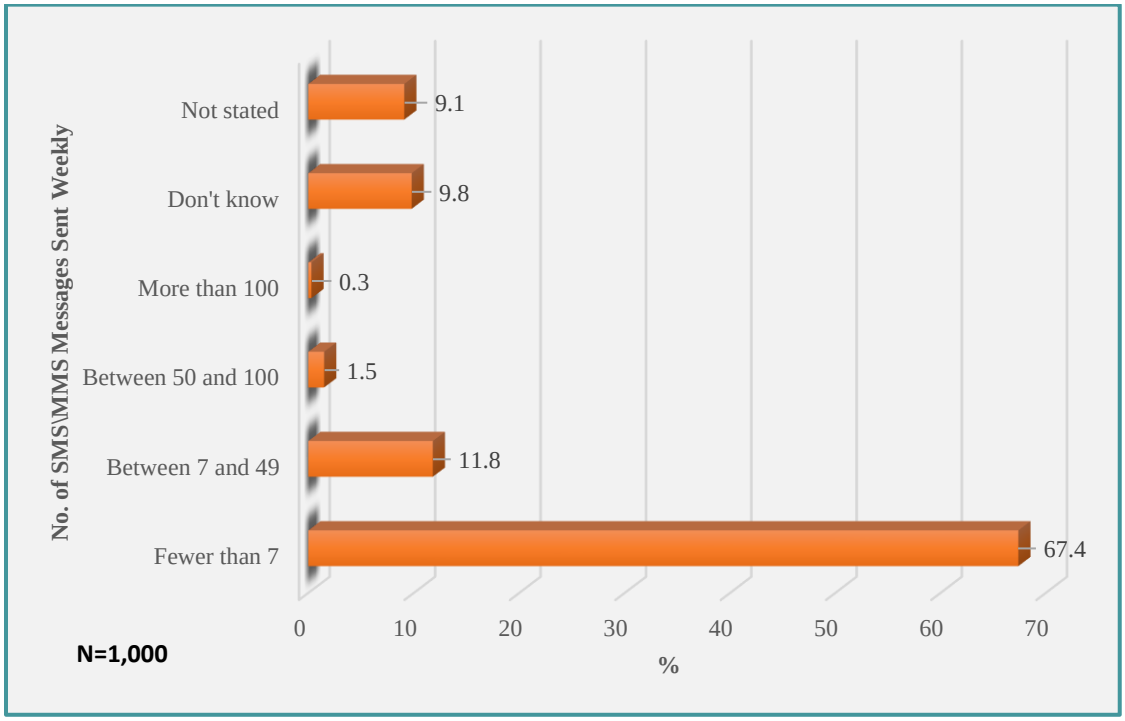


Figure 25. Number of text messages (SMS/MMS) sent each week

Approximately 67% of respondents indicated that they sent fewer than 7 SMS/MMS per week, while 11.8% sent between 7 and 49 per week.

Approximately 2% of respondents reported that they sent between 50 and 100 messages each week, and 18.9%[20] either did not know or did not wish to state the number.

[20] This is the summed value of 9.8% and 9.1%.

Figure 26 illustrates the frequency of MiFi (mobile data only) service usage.

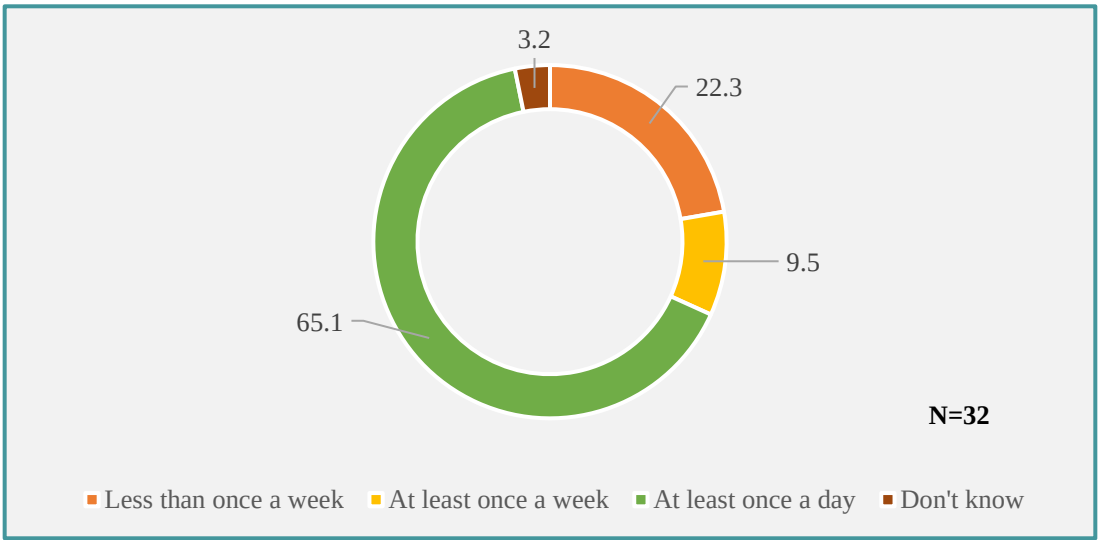


Figure 26. Frequency of MiFi (mobile data only) service usage

The majority of respondents, 65.1%, used MiFi services at least once a day each week. Respondents who used MiFi services less than once a week represented 22.3% of the sample. Those who used the service at least once a week accounted for 9.5% while 3.2% did not know how frequently they used MiFi services weekly.

3.3 PAYG Service Users

3.3.1 Mobile Call Services

Table 12 gives details on the distribution of the responses to the action to be taken if the price of mobile calls were to increase, by monthly expenditure (voice, messaging and data).

Table 12. Action to be taken if the price of mobile calls were to increase, by monthly expenditure (voice, messaging and data)

Monthly Expenditure TT$	Under $200		$200–$399		$400–$599		Above $600		Don't Know		Not Stated	
Proposed Price Increase TT$	$10		$10–$20		$20–$30		More Than $30					
Action To Be Taken	%	N	%	N	%	N	%	N	%	N	%	N
Make fewer calls	27.6	165	16.4	16	10.9	2	32.3	1	0.0	0	0.0	0
Make fewer calls but use OTT calls (such as Viber, Skype, Google Voice, WhatsApp, or FaceTime) instead	32.9	197	30.7	30	33.4	6	0.0	0	0.0	0	0.0	0
Make fewer calls, but use OTT messaging (such as WhatsApp, iMessage or WeChat) instead	7.3	44	5.1	5	8.9	2	0.0	0	0.0	0	0.0	0
Stop using PAYG mobile calls	0.7	4	2.5	2	0.0	0	0.0	0	0.0	0	0.0	0
Switch to a mobile prepaid or postpaid plan	9.6	57	11.3	11	12.0	2	24.8	1	0.0	0	0.0	0
Do nothing (or pay the specific increase and continue as normal)	18.6	111	29.6	29	34.9	6	42.9	1	0.0	0	0.0	0
Don't know	3.2	19	4.4	4	0.0	0	0.0	0	0.0	0	0.0	0
Not stated	0.1	1	0.0	0	0.0	0	0.0	0	100.0	0	100.0	0
Total	**100.0**	**597**	**100.0**	**97**	**100.0**	**17**	**100.0**	**3**	**100.0**	**0**	**100.0**	**0**

Approximately 33% of respondents indicated that, in response to a $10 increase in subscription price, they would make fewer calls and use OTTs for calls instead. Respondents who chose to make fewer calls accounted for 27.9%, while 18.6% reported that they would do nothing in response to the price increase.

Approximately 31% of respondents indicated that, in response to a proposed $10 to $20 increase in their subscription price, they would make fewer calls, but use OTT calls, while 29.6% would do nothing, and 16.4% would make fewer calls.

In response to a proposed price increase of $20 to -$30, 34.9% of respondents reported that they would do nothing, while 33.4% reported that they would make fewer calls but use OTT calls instead.
Assuming a price increase of more than $30, 42.9% of respondents would do nothing, 32.3% would make fewer calls, and 24.8% would switch to a mobile prepaid or post-paid plan.

Figure 27 shows, by percentage, the reasons for respondents doing nothing if their mobile service provider started charging more for mobile calls.

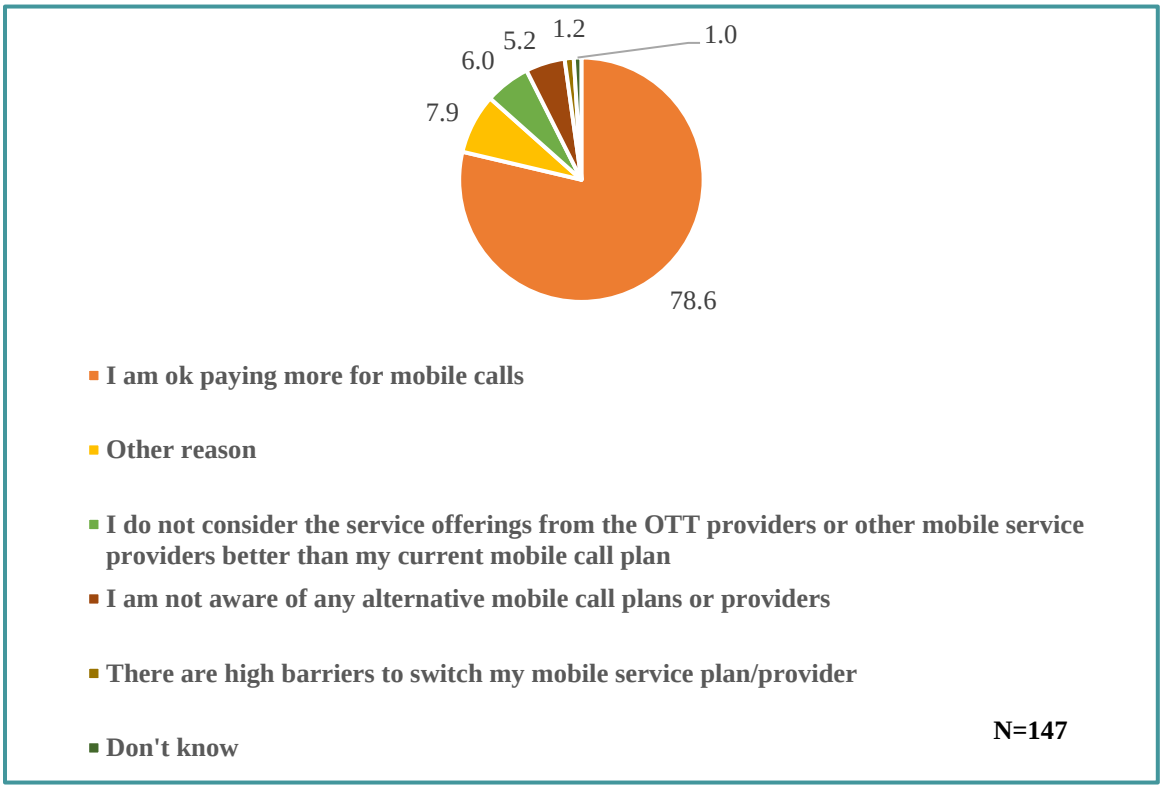


Figure 27. Reasons for doing nothing if service provider started charging more for mobile calls

Of the 147[21] respondents questioned, 78.6% indicated that they are okay paying more for mobile calls when asked for their reason for doing nothing if their mobile service provider started charging

[21] N=147 represents respondents who selected do nothing, as indicated in Table 12.

more for mobile calls. A further 6% of respondents said they did not consider the service offerings from the OTT providers or other mobile service providers better than their current mobile call plan, while 5.2% of respondents indicated that they were not aware of alternative mobile call plans or providers. A further 7.9% cited other[22] reasons for doing nothing.

[22] There were 12 responses in the "Other" category, which included "increase not significant enough to impact usage", "having no choice but to make calls", and "usage of mobile calls too limited to be impacted by increase".

Figure 28 presents the ranking, in two tiers, of the key advantages of respondents' current mobile service when compared to a fixed landline service.

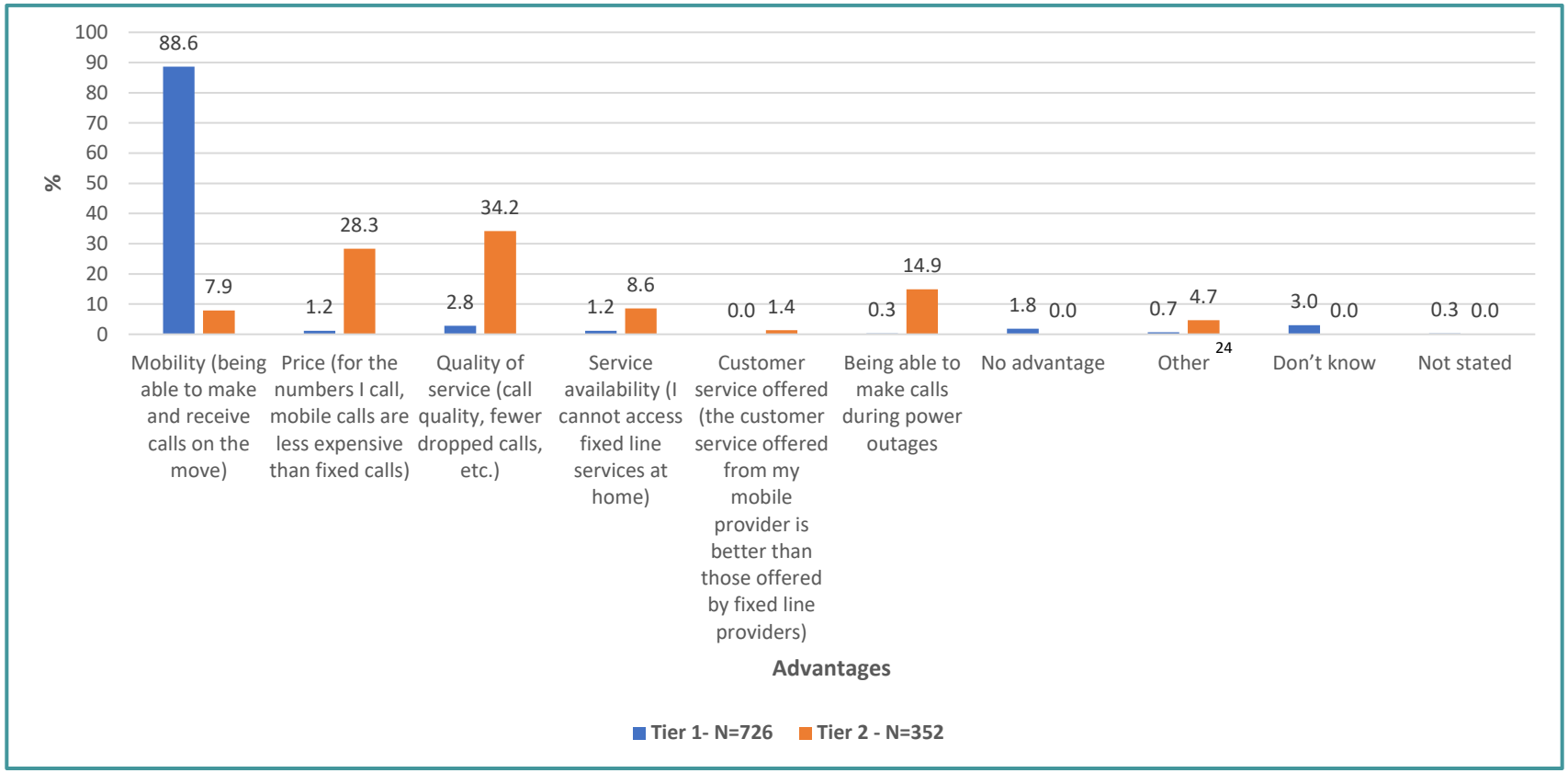


Figure 28. Ranking of key advantages of current mobile service over fixed landline service

[23]*Other option responses.*

[23] Twenty-two responses were provided for the category "Other", which included Internet connectivity, convenience, the ability to use apps including OTTs for calls, smaller size of the device, the ability to send texts, privacy, and better control of expenditure.

In the first ranked tier, 88.6% of respondents cited mobility as an advantage of their current mobile service when compared to fixed landline service. Respondents who selected quality of service as an advantage accounted for 2.8%, while no advantage was stated by 1.8% of respondents.

In terms of the second ranked advantages, not all respondents gave a second advantage as requested, resulting in 352 responses in that tier, with 34.2% choosing quality of service, 28.3% identifying price, and 14.9% selecting being able to make calls during power outages, as advantages of their current mobile service over a fixed landline service.

Figure 29 presents the ranking, in two tiers, of the disadvantages of respondents' current mobile service when compared to fixed landline service.

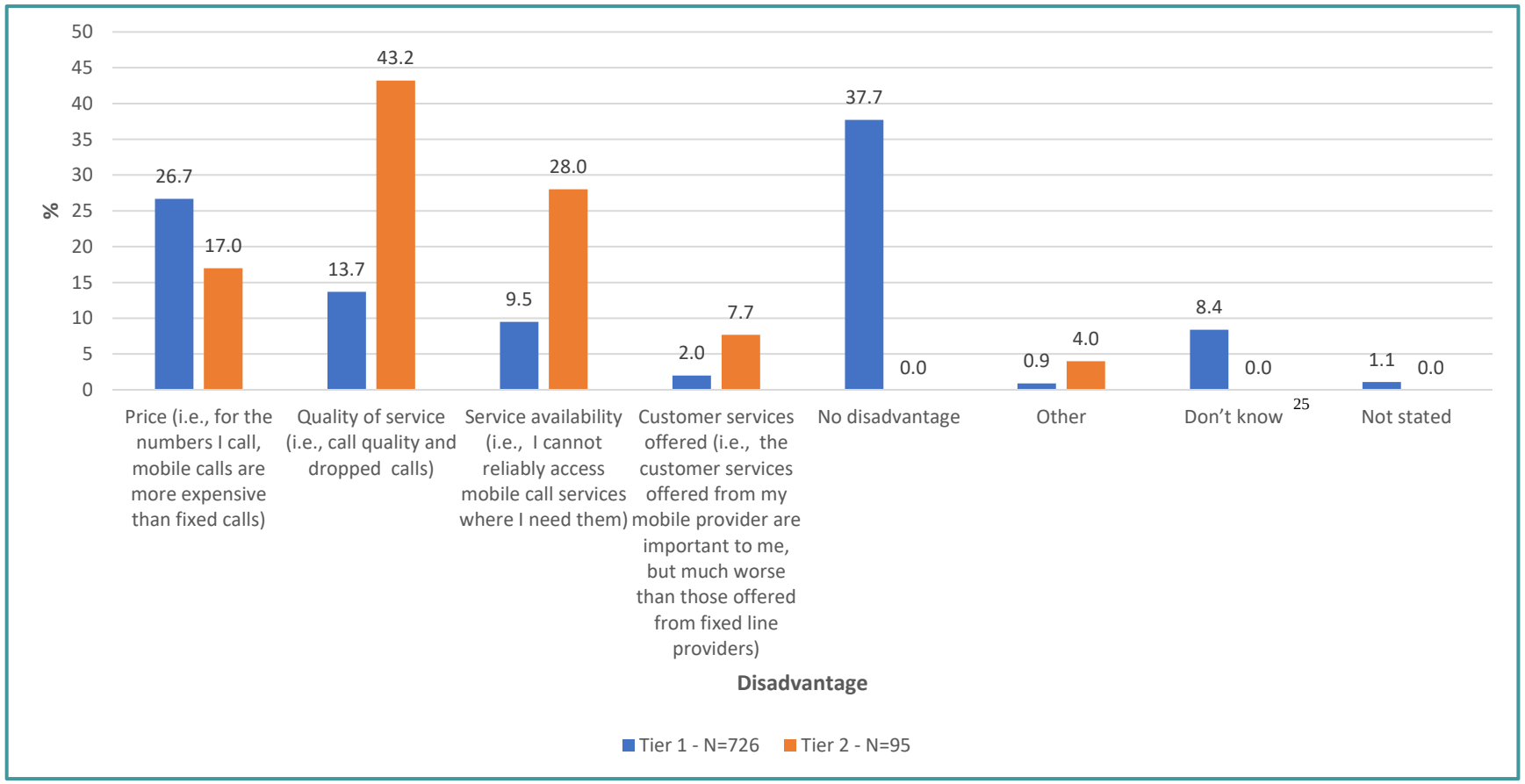


Figure 29. Ranking of disadvantages of current mobile service compared to fixed landline service

[24]*Other option responses.*

[24] Eleven responses were received in the "Other" category, which included inability to make calls when battery dies, damage to eyesight, ease of misplacing or damaging mobile phone, exposure to radiation, and location tracking.

In the first ranked tier, 37.7% of respondents cited no disadvantage when comparing their current mobile service to a fixed landline service. Respondents who selected price as a disadvantage accounted for 26.7%, while 13.7% identified quality of service as a disadvantage.

In terms of the second ranked disadvantages, not all respondents stated a second disadvantage as requested, resulting in 95 responses. In this tier, 43.2% of respondents indicated quality of service, 28% service availability and 17% price, as disadvantages of their current mobile service compared to a fixed landline service.

Figure 30 lists the ranking, in two tiers, of two key advantages of mobile service compared to OTT call services.

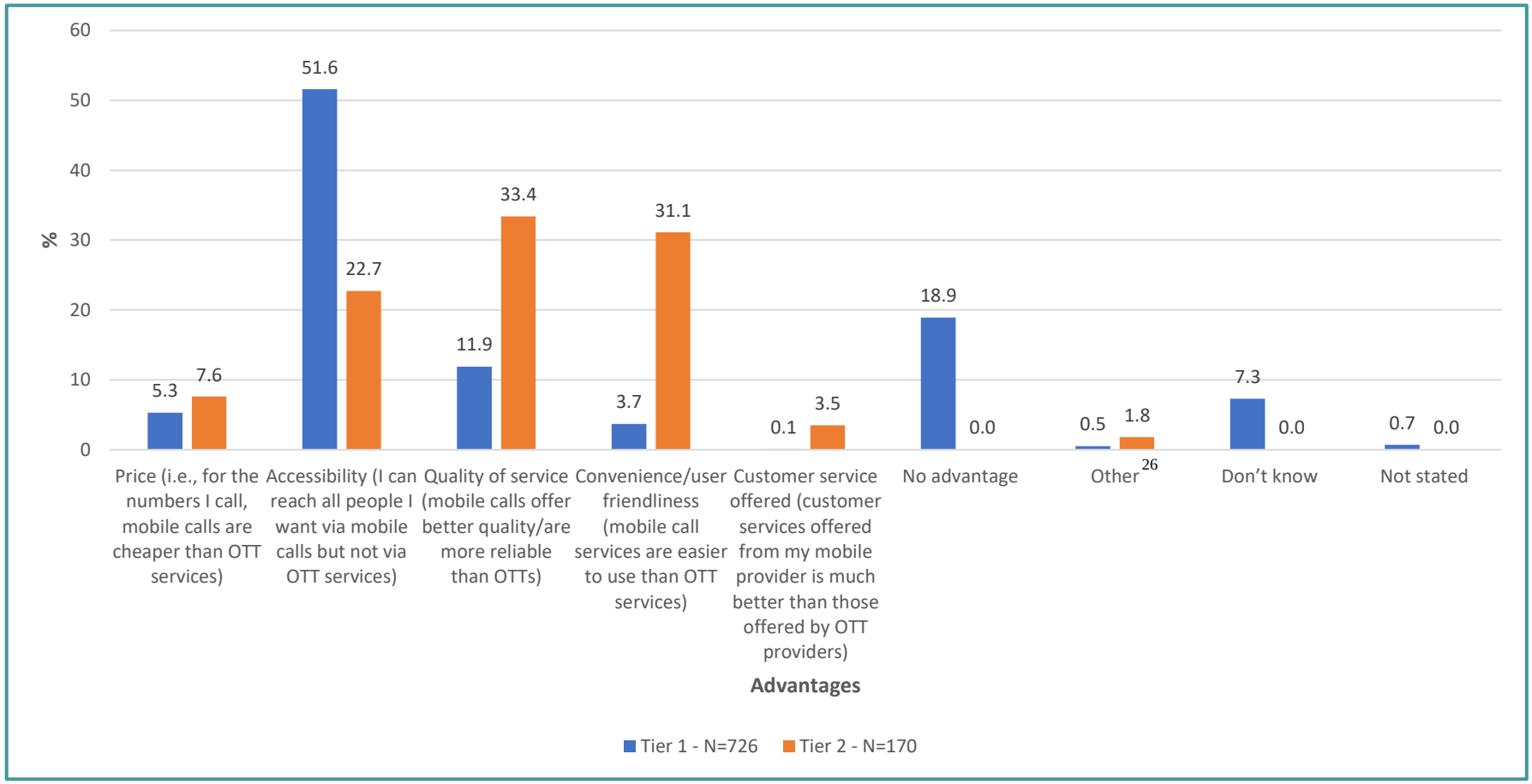


Figure 30. Ranking of key advantages of mobile service compared to OTT call services

[25]*Other option responses.*

[25] Seven responses were received in the "Other" category, which included no need for data services, and emergency call access.

In the first ranked tier, 51.6% of respondents reported that accessibility was an advantage of their mobile service compared to OTT call services. Approximately 20% of respondents indicated that they could find no advantage, while 11.9% identified quality of service as an advantage of mobile service compared to OTT call services.

In terms of the second ranked advantages, not all respondents provided a second advantage as requested, resulting in 170 responses in this tier, with. At the second ranked tier, 33.4% of respondents choosing quality of service, 31.1% convenience/user friendliness, and 22.7% accessibility, as advantages of their mobile service over OTT call services.

Figure 31 shows the key disadvantages, ranked in two tiers, of respondents' mobile service compared to OTT call services.

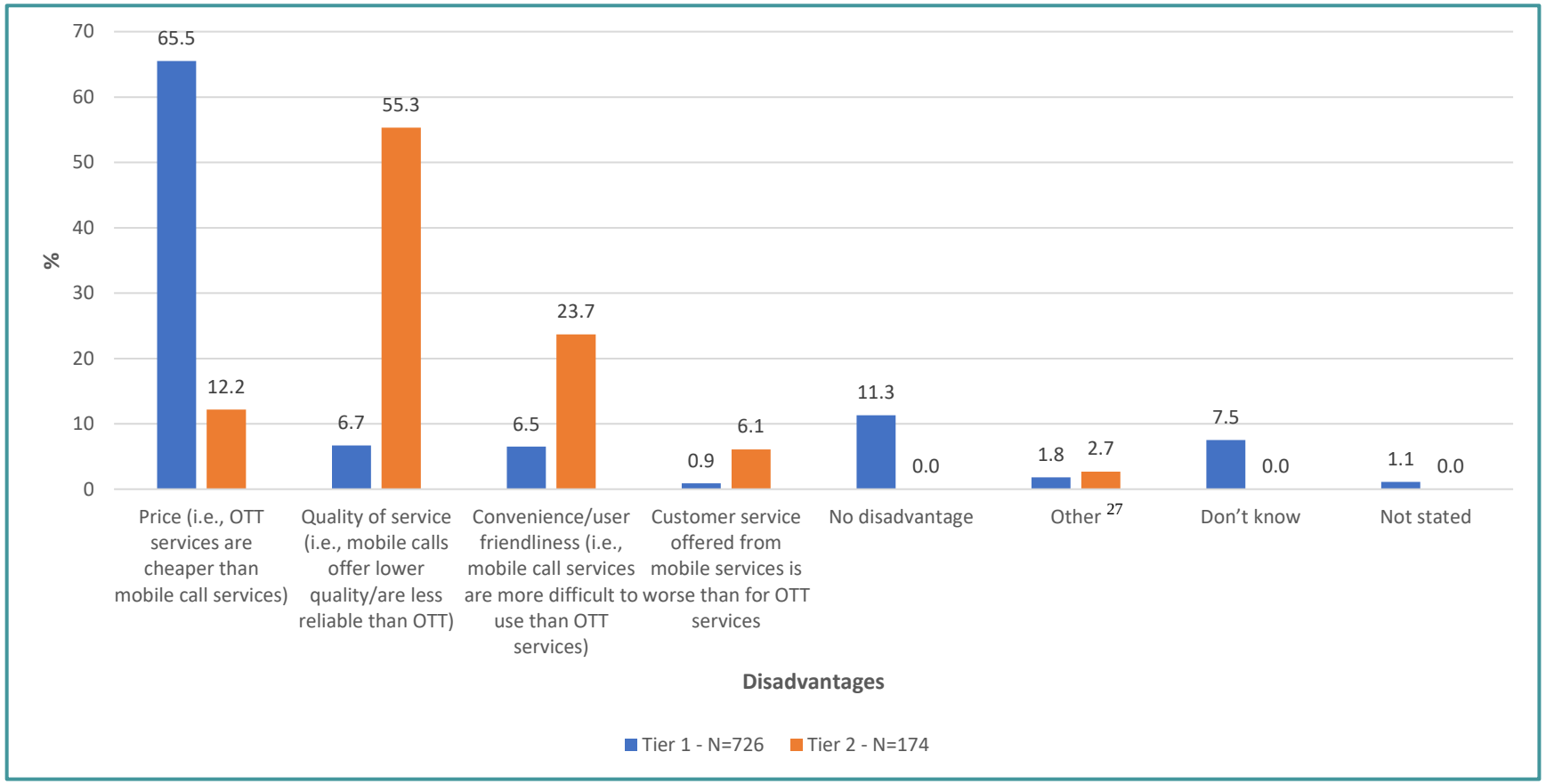


Figure 31. Ranking of disadvantages of mobile service compared to OTT call services

[26]*Other option responses.*

[26] Nine responses were provided in the "Other" category, which included lack of video, multimedia platform, and delayed service.

Figure 32 depicts, by percentage, respondents' answers to whether they had considered switching from their mobile call service plan to another plan within the previous six months.

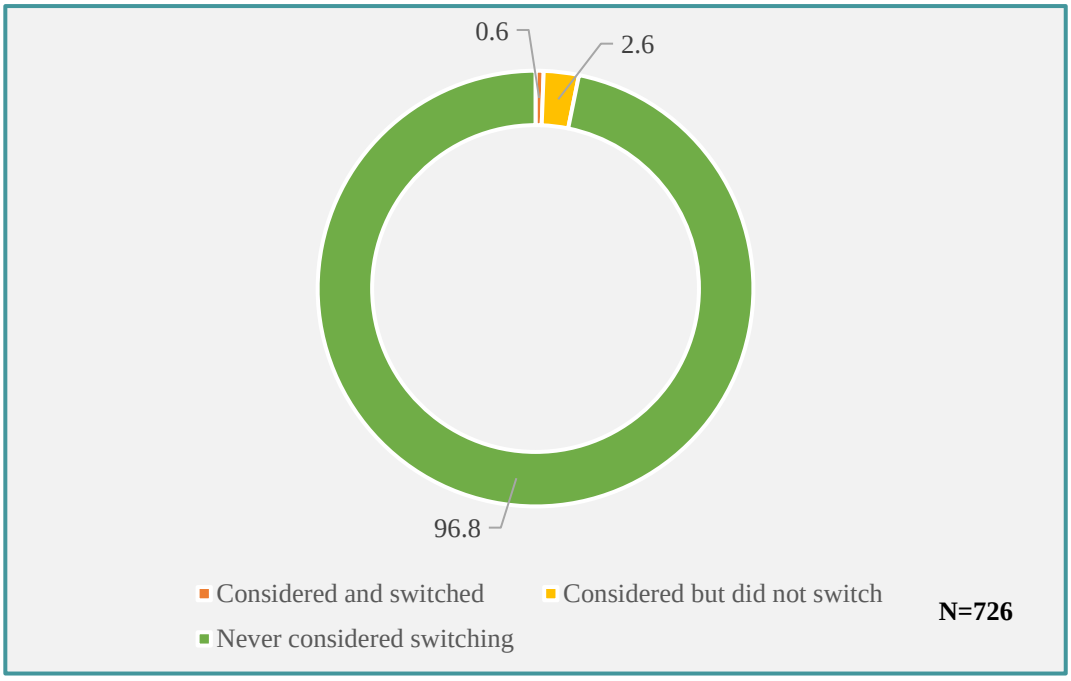


Figure 32. Considered switching from current mobile call service plan to another plan within the previous six months

Approximately 97% of respondents indicated that they had never considered switching within the preceding six months, from their mobile call service plan to another plan. Of all respondents, 2.6% indicated that they had considered it but did not switch, while five respondents, or 0.6%, indicated that they had considered and switched.

Table 13 presents the data on the three options stated by respondents regarding switching from their current mobile call service plan to another plan.

Table 13. Switching pattern from current mobile call service plan to another plan

Switching Pattern	N
I switched to a lower priced plan with my current provider	1
I switched to a lower priced plan with a new provider	2
Not stated	1
Total	**5**
N=5 – Represents respondents who selected "Considered and switched" in Figure 32.	

Figure 33 lists, by percentages, respondents' reasons for considering but not switching from their current mobile call service plan to a new plan.

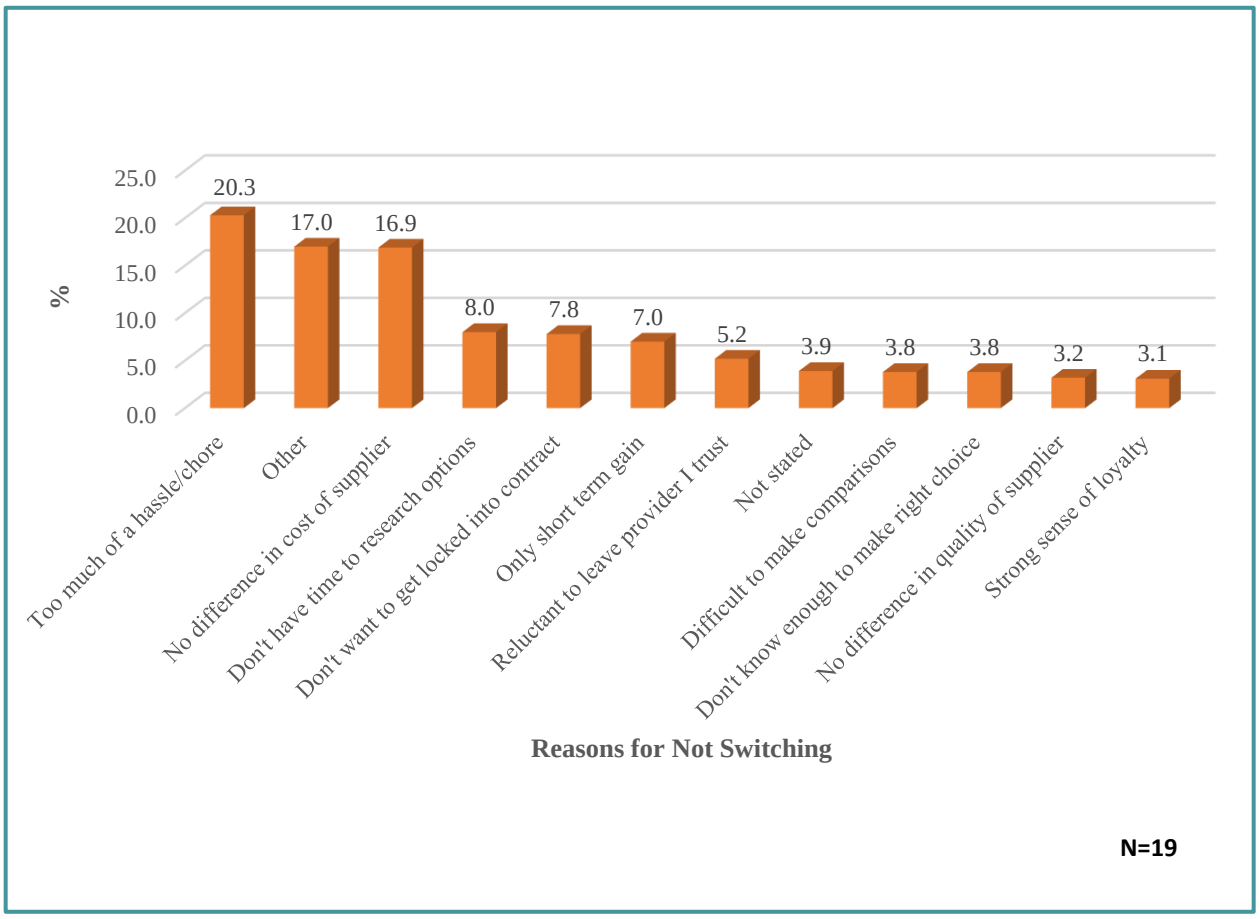


Figure 33. Reasons for considering but not switching from current mobile call service plan to a new plan

When asked about their reasons for considering but not switching from current mobile call service plan to a new plan, 20.3% of the 1927 respondents said it was too much of a hassle/chore, and 16.9% said that there was no difference in price. The third significant selection, at 17% of respondents, was the "Other"28 category.

Eight per cent of respondents indicated that they did not have time to research options; 7.8% stated they did not want to get locked into a contract; and 7% said there was only short-term gain, as reasons for considering but not switching from current mobile call service plan.

The least cited reasons reported by respondents for not switching to a new plan were a strong sense of loyalty, at 3.1%, and no difference in the quality of supplier, at 3.2%.

Figure 34 illustrates the ways respondents would reduce the number of calls made, on account of an increase in the cost of their mobile call subscription, by calling on OTTs.

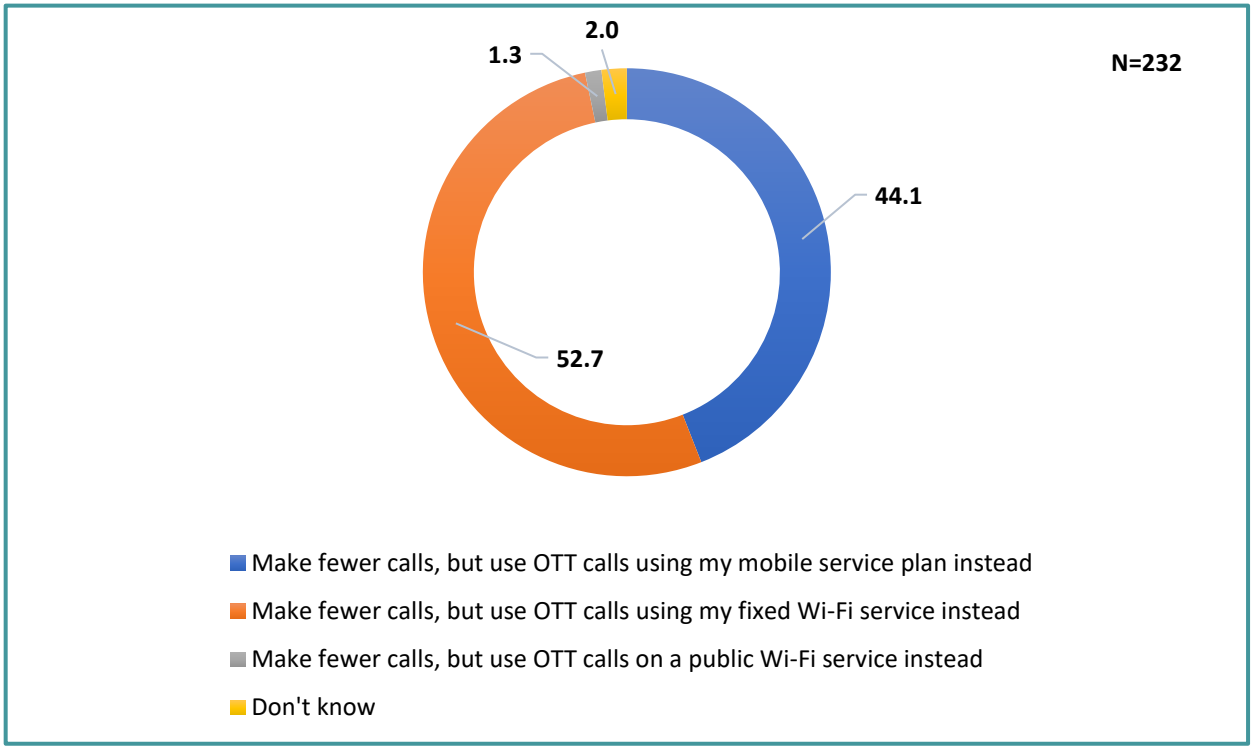


Figure 34. Ways to reduce number of calls made on account of an increase in cost of monthly mobile calls subscription by using OTTs

Of the 232[29] respondents who were asked about ways they would reduce the number of calls made, on account of an increase in the cost of their mobile calls subscription by using OTT calls, 52.7%

[27] N=19 represents respondents who selected "considered" but did not switch, as seen in Figure 32.

[28] There were five responses in the "Other" category, namely, "provider forcing obligation on customer", "cannot afford to", "do not want to lose number", "having faith in provider", and "convinced by provider to stay".

[29] N=232 represents respondents who selected "make fewer calls but use OTT calls" in Table 12.

indicated that they would make fewer calls and use their fixed Wi-Fi service to make calls on OTTs instead. A further 44.1% said they would make fewer calls and use OTT calls using their mobile service plans instead.

Approximately 1% indicated that they would make fewer calls and use OTT calls on a public Wi-Fi service instead, while 2% said that they did not know how they would reduce calls.

Figure 35 shows, by percentage, the ways respondents would reduce the number of calls made, on account of an increase in the cost of their mobile call subscription, by using OTT messaging as well or instead.

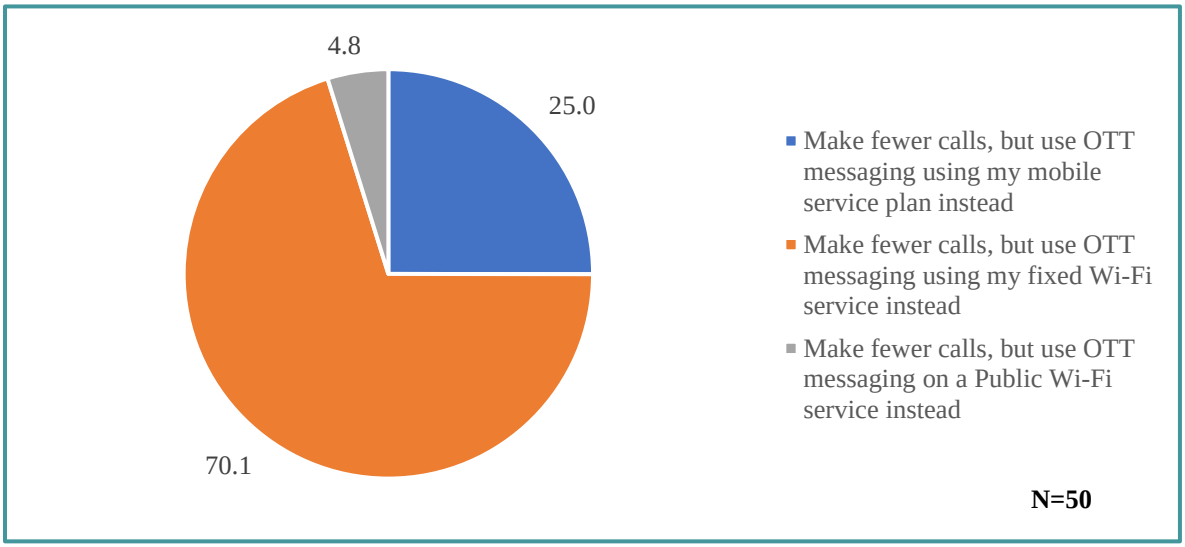


Figure 35. Ways to reduce number of calls made, on account of an increase in cost of mobile calls subscription using OTT messaging

Approximately 70% of the 50[30] respondents indicated that they would make fewer calls and use their fixed Wi-Fi service for OTT messaging instead when asked about ways to reduce the number of calls made on account of an increase in cost of mobile calls subscription using OTT messaging. A further 25% of respondents indicated that they would make fewer calls and use their mobile service plan instead, while 4.8% indicated that they would make fewer calls and use OTT messaging on a public Wi-Fi service instead.

[30] N=50 represents the respondents who selected "make fewer calls but use OTT messaging", depicted in Table 12.

3.3.2 Text Messaging (SMS/MMS)

Table 14 presents the respondents' actions to be taken if the cost of SMS/MMS were to increase.

Table 14. Action to be taken if the cost of SMS/MMS were to increase

Monthly Expenditure TT$	**Under $200**		**$200-$399**		**$400-$599**		**Above $600**		**Don't Know**		**Not Stated**	
Proposed Cost Increase TT$	**$1**		**$2-$3**		**$3-$5**		**$5-$10**					
Action To Be Taken	**%**	N	**%**	N	**%**	N	**%**	N	**%**	N	**%**	N
Send fewer text messages (SMS messages)	23.7	116	11.4	7	11.8	1	0.0	0	0.0	0	0.0	0
Send fewer text messages (SMS messages) and use more OTT messaging	16.7	81	9.0	5	0.0	0	0.0	0	0.0	0	0.0	0
Stop sending text messages (SMS messages) altogether	4.7	23	1.7	1	0.0	0	48.2	1	0.0	0	0.0	0
Use OTT messaging only	28.6	139	53.2	32	72.8	5	0.0	0	0.0	0	0.0	0
Do nothing	23.1	112	24.7	15	15.4	1	51.8	1	0.0	0	0.0	0
Don't know	2.7	13	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0
Not stated	0.4	2	0.0	0	0.0	0	0.0	0	0.0	0	100.0	0
Total	**100.0**	**487**	**100.0**	**59**	**100.0**	**7**	**100.0**	**2**	**100.0**	**0**	**100.0**	**0**

Just over 28% of respondents indicated that, in response to a proposed $1 increase in the cost of SMS/MMS messages, they would use OTT messaging only; 23.7% said they would send fewer text messages; 23.1% would do nothing; and 16.7% would send fewer text messages and use more OTT messaging.

Another 53.2% of respondents indicated that they would use OTT messaging only in response to a proposed $2 to $3 increase in the cost of SMS/MMS messages. Approximately 24.7% said they would do nothing, and 11.4% would send fewer text messages.

With a proposed $3 to $5 increase, 72.8% of respondents stated they would use OTT messaging only; and 15.4% would do nothing.

Based on a proposed $5 to $10 increase in the cost of SMS/MMS, 51.8% of respondents said they would do nothing and 48.2% said they would stop sending text messages (SMS messages) altogether.

Figure 36 presents the reasons respondents gave for doing nothing if their mobile service provider started charging more for text messages (SMS/MMS).

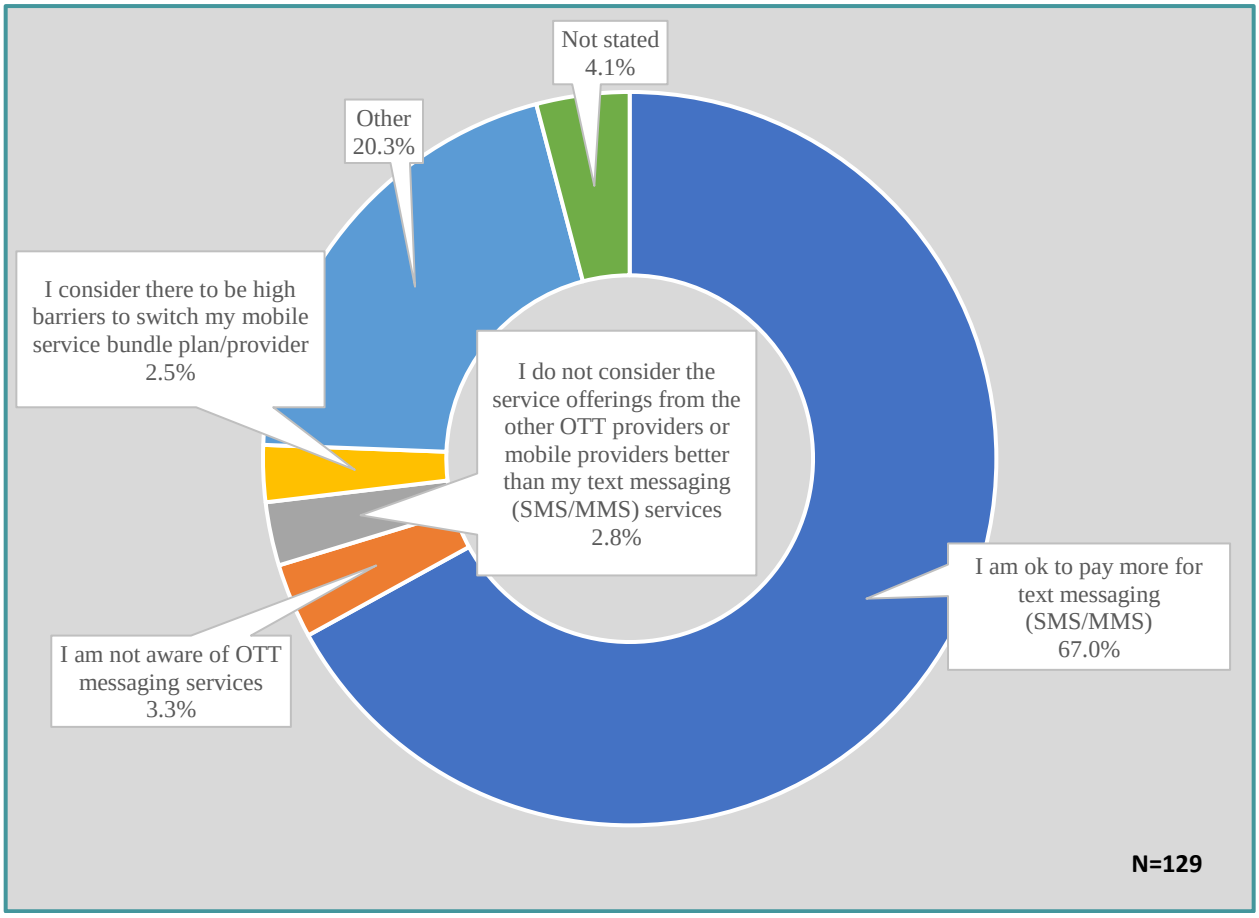


Figure 36. Reasons for respondents doing nothing if their mobile service provider started charging more for text messages (SMS/MMS)

When asked to give reasons for doing nothing if their mobile service provider started charging more for text messages, 67% of the 12931 respondents were okay with paying for text messaging, while 20.3% provided other32 reasons. Respondents who considered there to be high barriers to switching their mobile service bundle plan/provider accounted for 2.5% of responses, while 3.3% reported that they were not aware of OTT messaging services.

[31] N=129 represents respondents who selected do nothing, as seen in Table 14.

[32] Twenty-seven responses were provided in the "Other" category, which included "don't use SMS", "rarely use SMS", and "OTT calls are free".

Figure 37 gives details on the ranking, in two tiers, of advantages of text messaging (SMS/MMS) services compared to OTT messaging services.

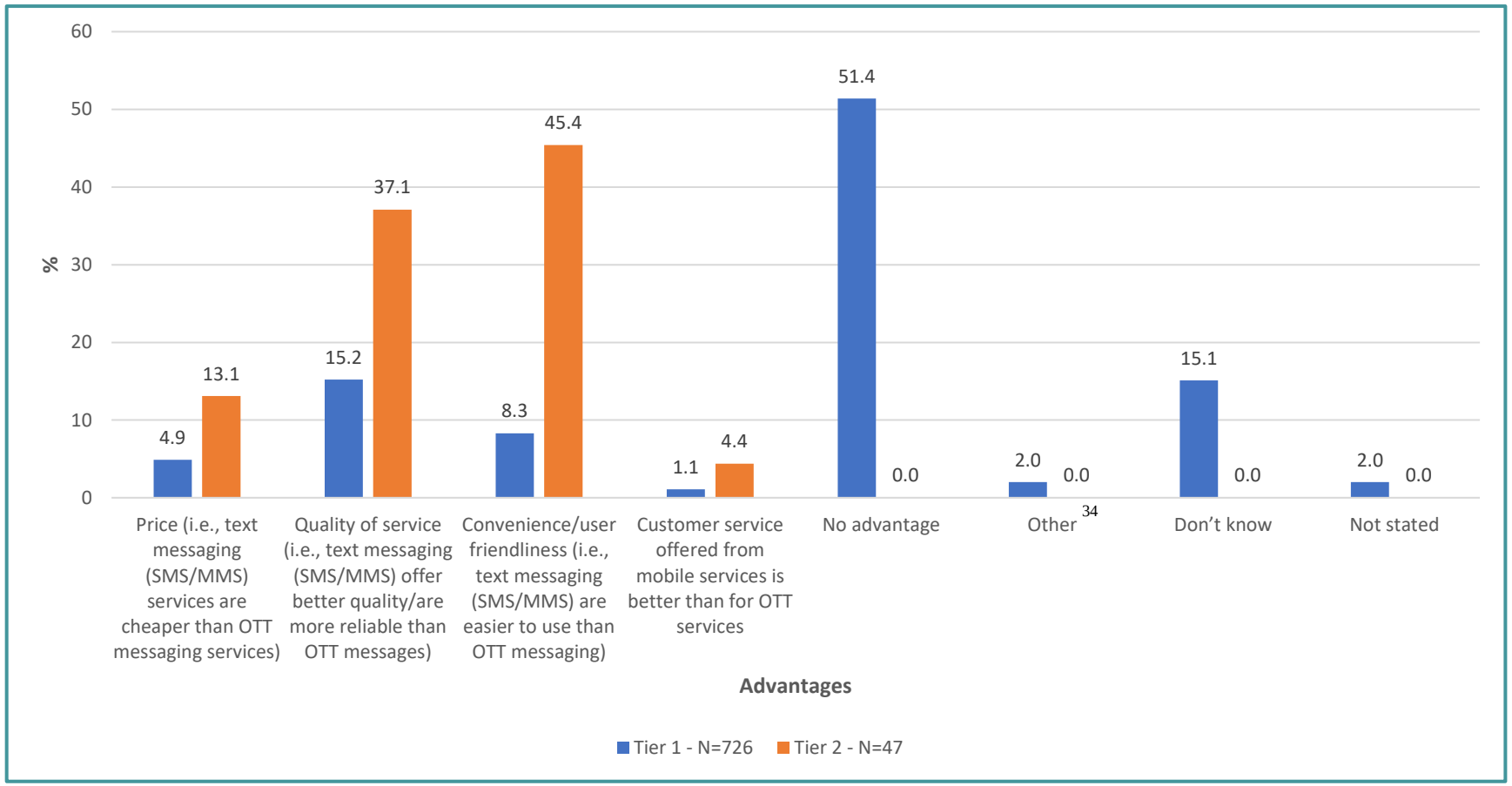


Figure 37. Ranking of key advantages of text messaging (SMS/MMS) services compared to OTT messaging services

[33]*Other option responses.*

[33] Sixteen responses were provided in the "Other" category, which included "accessibility to persons not using WhatsApp", "no data needed", "caters for the elderly and other persons without smartphones", and "no requirement for Internet access".

In the first ranked tier, 51.4% of respondents indicated that there was no advantage of text messaging services compared to OTT messaging service, and 15.2% selected quality of service. Approximately 15% of respondents did not know of any advantage.

In terms of the second ranked advantages, not all respondents provided a second advantage as requested, resulting in 47 responses in this tier, with 45.4% citing convenience/user friendliness; 37.1% quality of service; and 13.1% price as the third top advantage of text messaging (SMS/MMS) services over OTT messaging services.

Figure 38 ranks, in two tiers, the disadvantages of text messaging (SMS/MMS) services when compared to OTT messaging services.

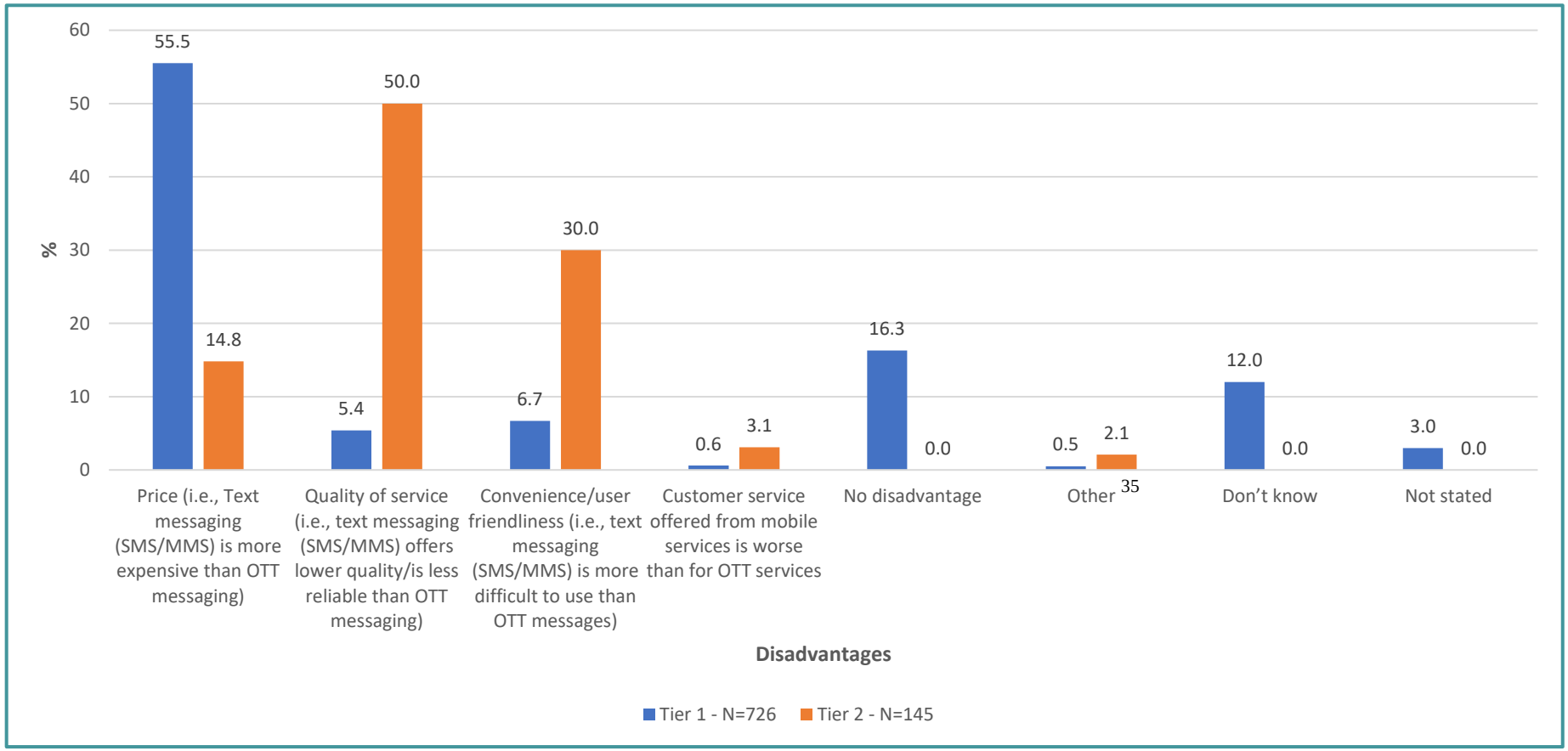


Figure 38. Ranking of key disadvantages of text messaging (SMS/MMS) services compared to OTT messaging services

[34]*Other option responses.*

[34] Seven responses were provided in the "Other" category, which included "inability to send pictures and videos", and "less flexible platform".

In the first ranked tier, 55.5% of respondents selected price as the first top disadvantage of text messaging services compared to OTT messaging services. A further 16.3% said there was no disadvantage of one service over the other, while 12% of all respondents indicated that they did not know of any disadvantage.

In terms of the second ranked disadvantages, not all respondents provided a second disadvantage as requested, resulting in 145 responses. In this tier, 50% of respondents said that quality of service was the first top disadvantage, 30% chose convenience/user friendliness as the second top disadvantage, and 14.8% identified price as the third top disadvantage.

3.3.3 Mobile Data

Table 15 provides data on the actions to be taken if the cost of mobile data were to increase.

Table 15. Action to be taken if the cost of mobile data were to increase

Monthly Expenditure TT$	**Under $200**		**$200-$399**		**$400-$599**		**Above $600**		**Don't Know**	
Proposed Cost Increase TT$	**$10**		**$10-$20**		**$20-$30**		**Above $30**			
Action To Be Taken	**%**	**N**	**%**	**N**	**%**	**N**	**%**	**N**	**%**	**N**
Stop using mobile data services altogether	12.2	11	10.0	4	7.3	1	32.3	1	0.0	0
Use less mobile data but stay on my current plan	5.3	5	17.6	8	0.0	0	0.0	0	0.0	0
Use less mobile data by offloading to Wi-Fi where possible	23.7	22	21.6	10	31.3	4	0.0	0	0.0	0
Switch to another mobile service offering	15.2	14	16.6	7	18.1	2	0.0	0	0.0	0
Use mobile call or SMS/MMS services on my current mobile plan	3.8	4	0.0	0	13.9	2	0.0	0	0.0	0
Do nothing	36.9	34	34.1	15	23.7	3	67.7	2	0.0	0
Don't know	1.7	2	0.0	0	5.6	1	0.0	0	0.0	0
Not stated	1.2	1	0.0	0	0.0	0	0.0	0	100.0	0
Total	**100.0**	**92**	**100.0**	**45**	**100.0**	**12**	**100.0**	**3**	**100.0**	**0**

With a proposed $10 cost increase for mobile data, 36.9% of respondents indicated that they would do nothing; 23.7% would use less mobile data by offloading to Wi-Fi where possible; 15.2% would switch to another mobile service offering; and 12.2% would stop using mobile data services altogether.

With respect to a proposed $10 to $20 increase, 34.1% of respondents stated they would do nothing; 21.6% would use less mobile data by offloading to Wi-Fi where possible; 17.6% would use less mobile data but stay on their current plan; and 16.6% would switch to another mobile service offering.

In response to a proposed $20 to $30 cost increase, 31.3% said they would use less mobile data by offloading to Wi-Fi where possible; 23.7% would do nothing; 18.1% would switch to another mobile service offering; and 13.9% would use mobile call or SMS/MMS services on their current mobile plan.

With a proposed cost increase of above $30, 67.7% of respondents stated they would do nothing, while 32.3% said they would stop using mobile data services altogether.

Figure 39 shows the reasons, by percentages, that respondents gave for doing nothing if their mobile service provider increased the cost of mobile data service.

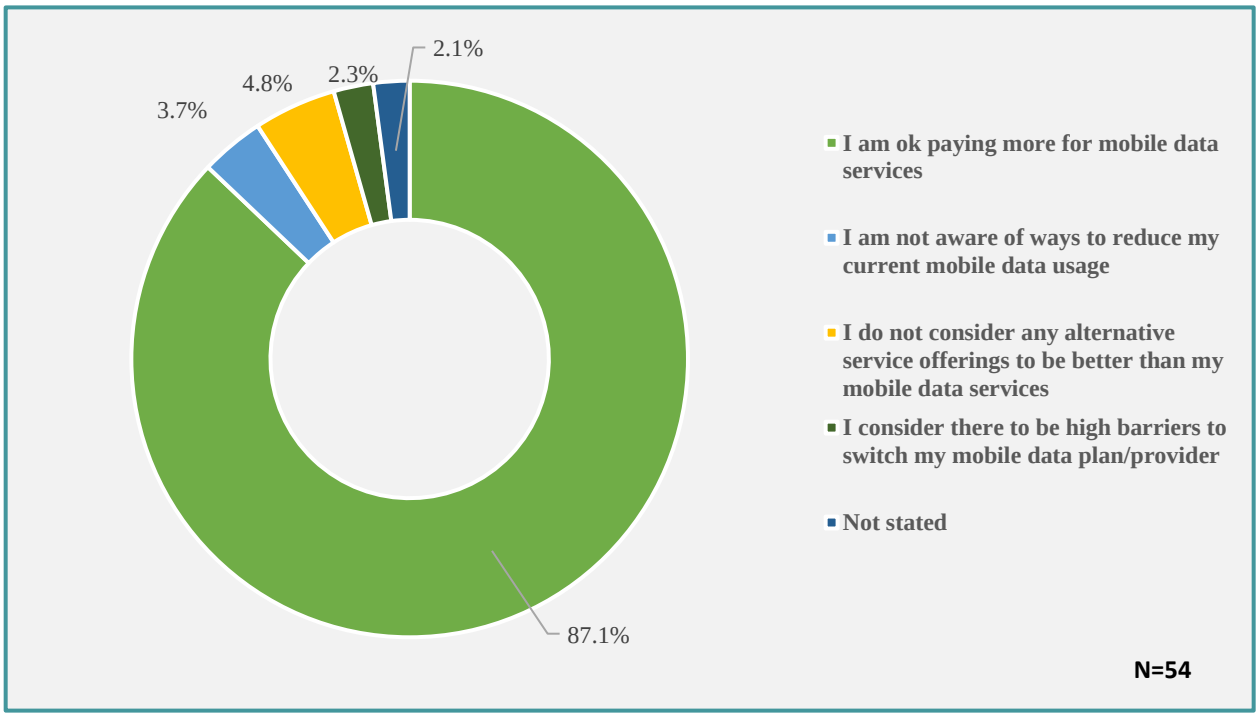


Figure 39. Reasons for doing nothing if mobile service provider increased the cost of mobile data service

When asked to give reasons for doing nothing if their mobile service provider increased the cost of mobile data service, 87.1% of 5435 respondents indicated that they were okay with paying more for mobile data services; 4.8% did not consider any alternative service offering to be better than their current mobile data services; and 3.7% reported that they were not aware of any ways to reduce their current mobile data usage.

Just over 2% of respondents either selected high barriers to switching their mobile data plan/provider or did not state their reasons for doing nothing.

Figure 40 depicts whether respondents had considered switching to another mobile data plan within the preceding six months.

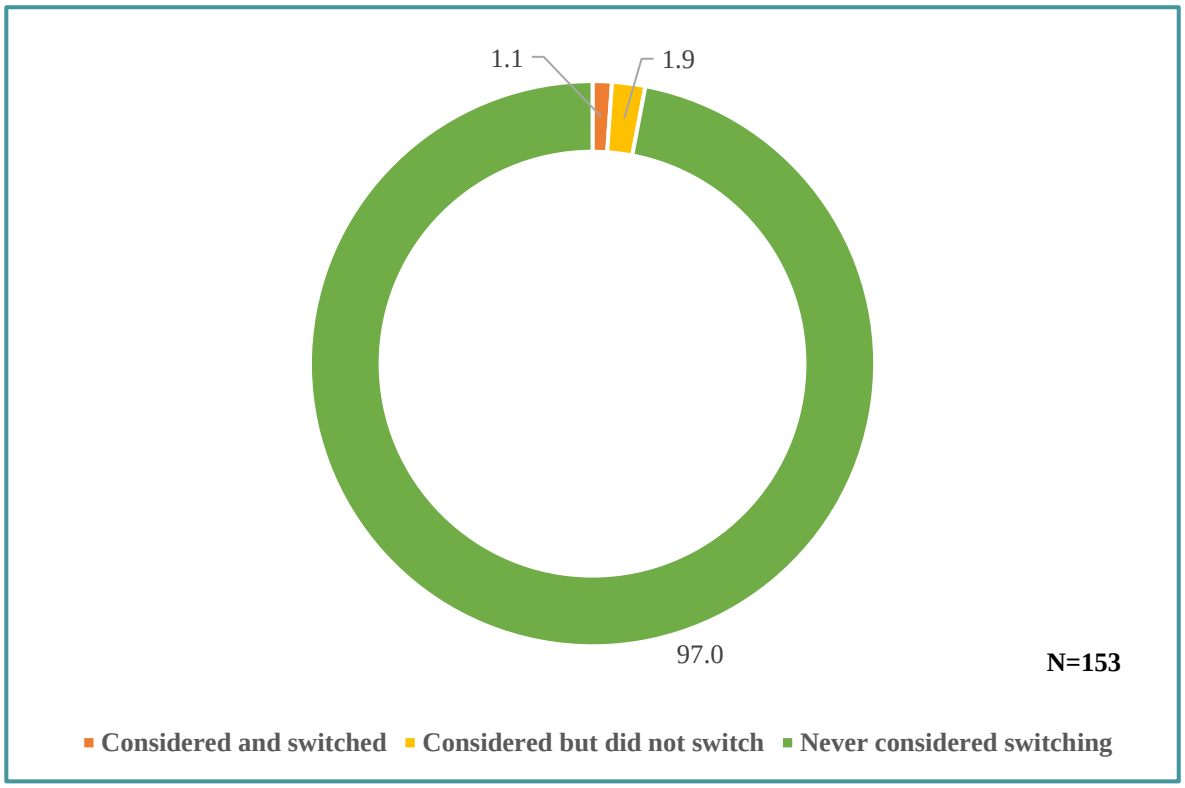


Figure 40. Considered switching to another mobile data plan within the previous six months

Of the 153 respondents who were asked if, within the preceding six months, they had considered switching to another mobile data plan, 97% reported they had never considered switching, 1.9% said they had considered but did not switch; and 1.1% considered and switched.

[35] N=54 represents respondents who selected do nothing, as seen in Table 15.

Table 16 presents data on respondents' switching to another mobile data plan.

Table 16. Switching from current mobile data plan to another plan

Switching Pattern	N
I switched to a lower priced plan with a new provider	2
Total	**2**
N=2[36] – Represents respondents who selected "Considered and switched" in Figure 40.	

The two respondents who had switched to another mobile data plan within the preceding six months switched to a lower priced plan with a new provider.

Table 17 gives the reasons three respondents provided for not switching to a new mobile data plan.

Table 17. Reasons for not switching to a new mobile data plan

Reasons	N
Reluctant to leave provider I trust for one I don't know	1
Don't know enough to make right choice	1
Don't want to lose number	1
Total	**3**
N=3 – Represents respondents who selected "Considered but did not switch" in Figure 40. Multiple response question – N represents total responses received.	

[36] No other response option was selected for this question.

3.4 Prepaid and Postpaid Service Users

Three hundred and thirty-four respondents, or 33.4% of all respondents, were prepaid and postpaid service users.

3.4.1 Pricing Considerations

Table 18 presents the respondents' actions to be taken if the cost of their mobile plan/package increased.

Table 18. Actions to be taken if the cost of mobile plan/package increased

Monthly Expenditure TT$	**Under $200**		**$200-$399**		**$400-$599**		**Above $600**		**Don't Know**	
Proposed Cost Increase TT$	**$10**		**$10-$20**		**$20-$30**		**Above $30**			
Action To Be Taken	**%**	**N**	**%**	**N**	**%**	**N**	**%**	**N**	**%**	**N**
Make fewer mobile calls or stop making calls altogether	17.3	16	5.6	10	9.5	5	18.0	2	0.0	0
Send fewer SMS/MMS calls or stop sending SMS/MMS calls altogether	1.0	1	0.6	1	2.0	1	0.0	0	0.0	0
Use OTT call or messaging services instead	17.1	16	21.9	39	21.8	11	6.9	1	0.0	0
Use less mobile data or stop using mobile data altogether	7.0	7	1.3	2	1.4	1	0.0	0	0.0	0
Change to another plan or package	26.9	25	33.4	59	32.0	16	16.6	2	0.0	0
Stop using mobile services altogether	1.7	2	3.0	5	1.7	1	0.0	0	0.0	0
Do nothing	26.7	25	32.0	57	31.5	16	58.5	6	0.0	0
Don't know	2.2	22	2.1	4	0.0	0	0.0	0	0.0	0
Not stated	0.0	0	0.0	0	0.0	0	0.0	0	100.0	0
Total	**100.0**	**94**	**100.0**	**177**	**100.0**	**50**	**100.0**	**10**	**100.0**	**0**

With a proposed cost increase of $10 in the cost of their mobile plan/package, 26.9% of respondents indicated that they would switch to another plan or package; 26.7% would do nothing; 17.3% would make fewer mobile calls or stop making calls altogether; and 17.1% would use OTT call or messaging services instead.

In response to a proposed cost increase of $10 to $20, 33.4% of respondents would use OTT call or messaging services instead; 32% would do nothing; and 21.9% would use OTT call or messaging services instead.

With a proposed cost increase of $20 to $30, 32% indicated they would change to another plan or package; 31.5% said they would do nothing; and 21.8% would use OTT call or messaging services instead.

Nearly 59% of respondents reported that they would do nothing in response to a proposed increase above $30. A further 18% indicated that they would make fewer mobile calls or stop making calls altogether, while 16.6% would change to another plan or package.

Figure 41 shows the reasons respondents gave for doing nothing if their mobile service provider started charging more for their mobile plan/package.

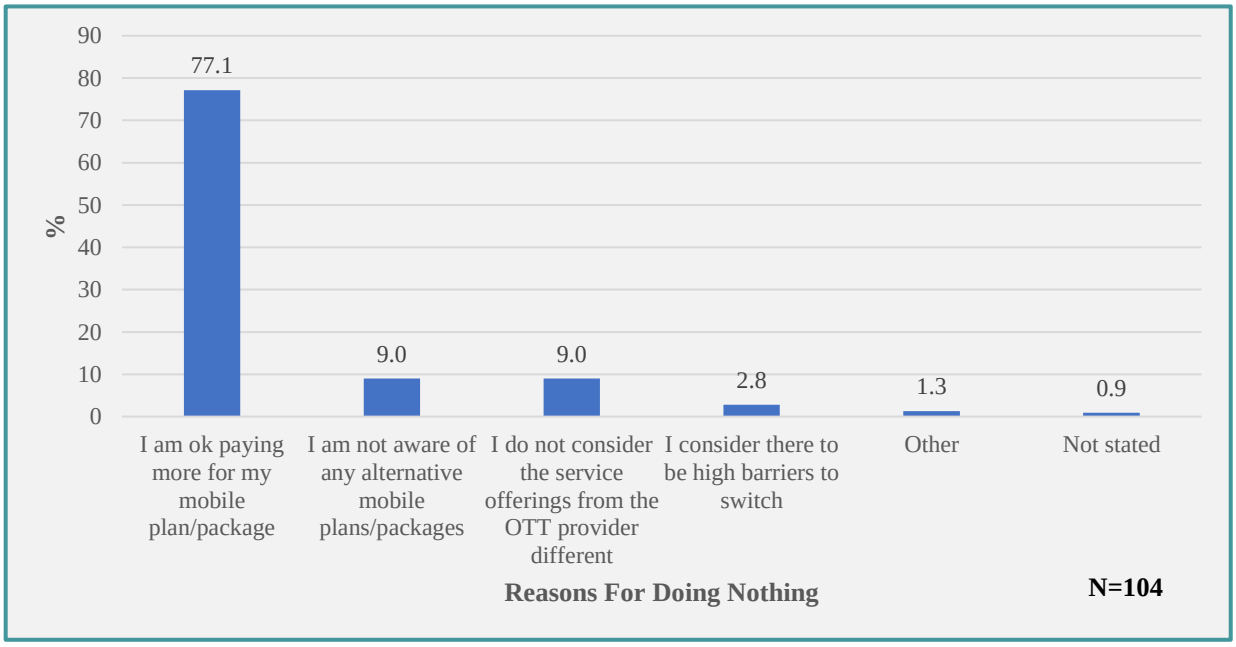


Figure 41. Reasons for doing nothing if mobile service provider started charging more for mobile plan/package

In response to giving reasons for doing nothing if their mobile service provider started charging more for their mobile plan/package, approximately 77% of 10437 respondents said that they were okay with paying more for their mobile plan/package. Of all respondents, 9% indicated that they were unaware of any alternative mobile plans/packages, while a further 9% did not consider the service offerings from the OTT provider to be different.

Approximately 3% of all respondents considered there to be high barriers to switching as the reason for doing nothing; 1.3% identified other reasons; and 0.9% did not state any reasons.

Figure 42 depicts the respondents' actions to be taken to reduce the number of calls made if their mobile service provider were to increase the cost of their mobile plan/package.

[37] N=104 represents respondents who selected do nothing in Table 18.

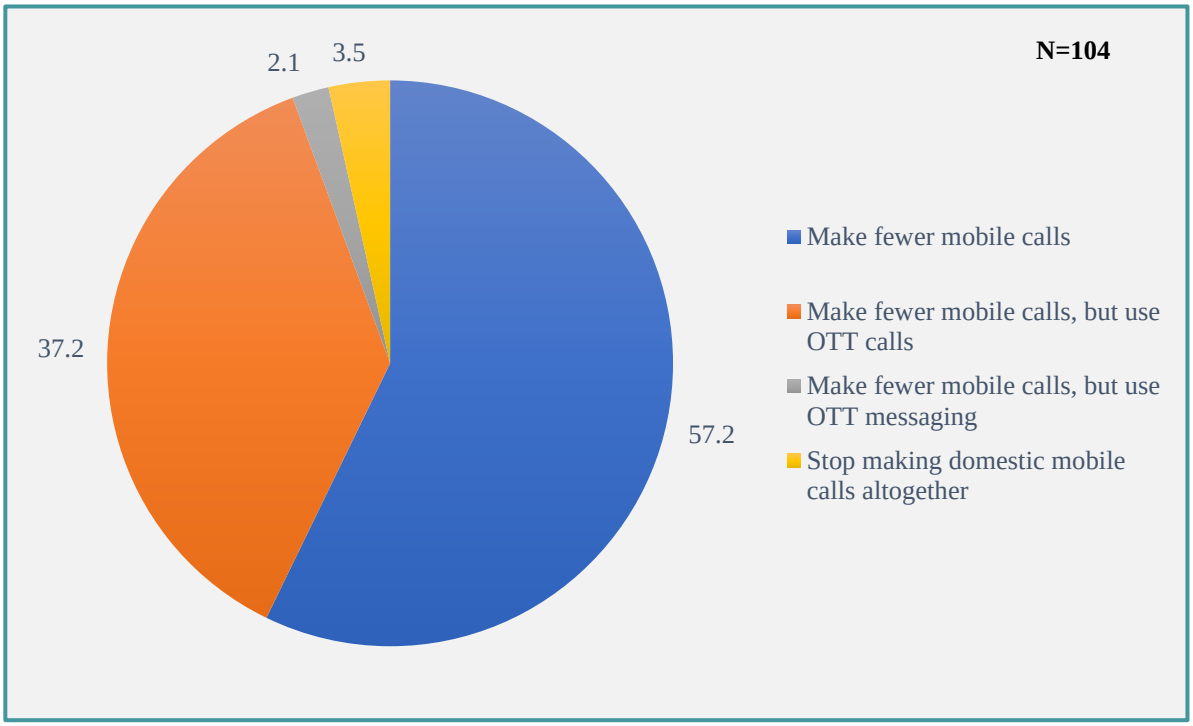


Figure 42. Actions to be taken to reduce the number of calls made if mobile service provider were to increase the cost of mobile plan/package

Regarding the respondents' actions to be taken to reduce the number of calls if their mobile service provider were to increase the cost of their plan/package, 57.2% of 104[38] respondents indicated that they would make fewer mobile calls. A further 37.2% said they would make fewer mobile calls and use OTT calls.

Approximately 4% of respondents would stop making domestic mobile calls altogether, while 2.1% would make fewer mobile calls and use OTT messaging.

[38] N=104 represents respondents who selected make fewer mobile calls or stop making calls altogether in Table 18.

Table 19 gives details on the actions to be taken by respondents if their mobile service provider were to increase the cost of text messaging.

Table 19. Actions to be taken if mobile service provider were to increase the cost of text messaging

Actions	N
I will send fewer text messages (SMS/MMS)	1
Stop sending text messages (SMS/MMS) altogether	1
I will use OTT messaging only	1
Total	**3**
N=3 – Represents respondents who selected "Send fewer SMS/MMS calls or stop sending SMS/MMS calls altogether" in Table 18	

Only three respondents cited actions they would take if their mobile service provider were to increase the cost of text messaging. These actions included sending fewer text messages, stop sending text messages altogether, and using OTT messaging only.

Figure 43 presents data on the ways in which OTT calls/messaging would be used by respondents on account of an increase in the cost of their mobile plan/package subscription.

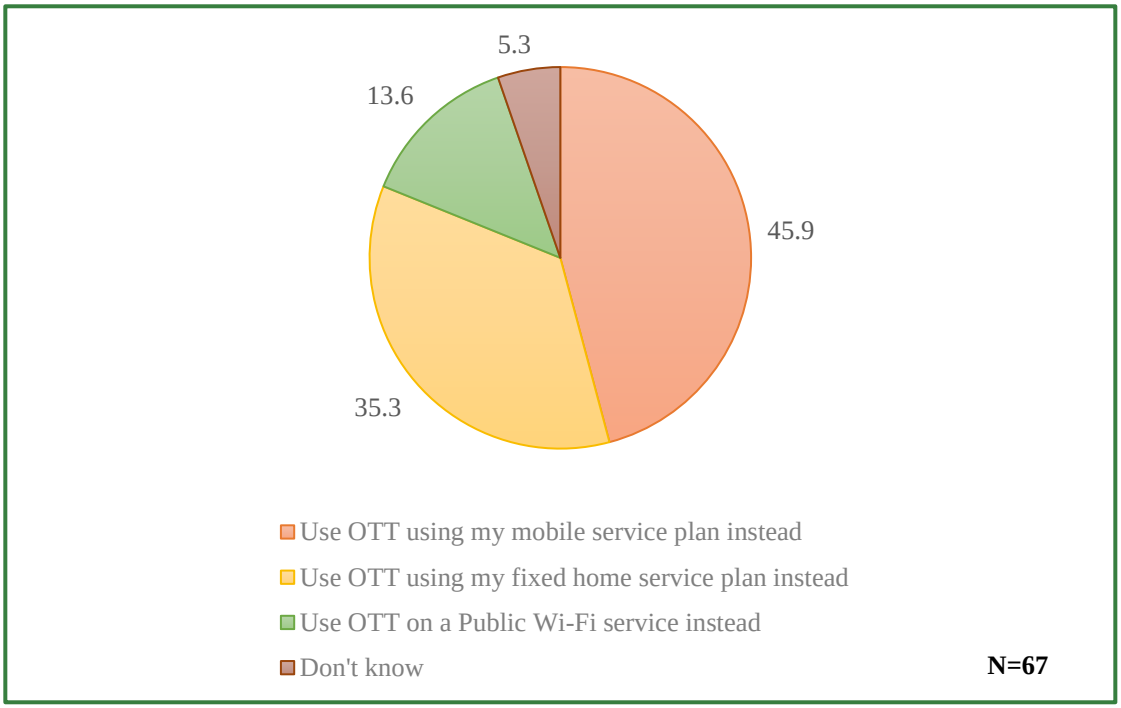


Figure 43. Ways in which respondents would use OTT calls/messaging on account of an increase in the cost of their monthly mobile plan/package subscription

When asked about the way in they would access OTT call/messaging services in the event of an increase in the cost of their mobile plan/package subscription, 45.9% of 67[39] respondents indicated that they would use OTT using their mobile service plan instead, while a further 35.3% said they would use their fixed home service plan instead to access OTTs.

[39] N=67 represents respondents who selected "use OTT call or messaging service instead", as shown in Table 18.

Approximately 14% of respondents stated they would use OTT services on a public Wi-Fi service instead, and 5.3% did not know how they would use OTT calls/messaging on account of an increase in the cost of their mobile plan.

Table 20 lists the respondents' actions to be taken to reduce their use of mobile data if their mobile service provider were to increase the cost of their mobile data-only plan/package.

Table 20. Actions to be taken to reduce the use of mobile data if mobile service provider were to increase the cost of mobile data-only plan/package

Actions	**N**
Stop using mobile data services all together	1
Use less mobile data, but stay on my current plan	5
Use less mobile data by offloading to Wi-Fi where possible	4
Total	**10**
N=10[40]	

Ten respondents to the survey reported that they would reduce their use of mobile data in response to an increase in the cost of their mobile plan.

[40] N=10 represents respondents who selected "use less mobile data" or "stop using mobile data altogether", as seen in Table 18.

3.4.2 Advantages and Disadvantages

Figure 44 shows the ranking, in two tiers, of key advantages of respondents' current mobile call plans compared to a fixed landline service.

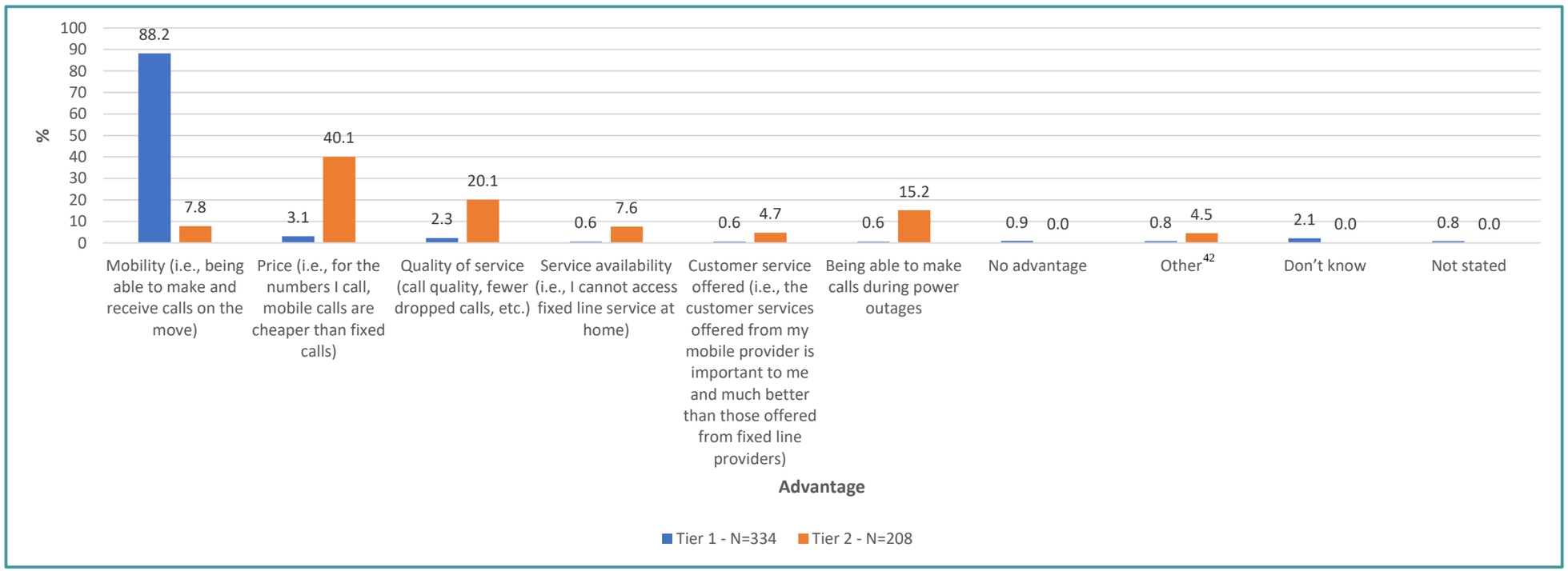


Figure 44. Ranking of key advantages of current mobile call plans compared to fixed landline service

[41]*Other option responses.*

[41] Thirteen responses were received in the "Other" category, which included accessing information on the go, convenience and ease of access, Internet access, unlimited calls and unlimited data, and using social media platforms.

In the first ranked tier, 88.2% of respondents cited mobility as an advantage of their current mobile call plan compared to a fixed landline service.

In terms of the second ranked advantages, not all respondents provided a second advantage as requested. Thus, 208 responses were captured in this tier, with 40.1% stating price as an advantage, 20.1% quality of service, and 15.2% citing being able to make calls during power outages, as advantages of their current mobile call plan over a fixed landline service.

Figure 45 presents the ranking, in two tiers, of the key disadvantages of respondents' current mobile call plan compared to a fixed landline service.

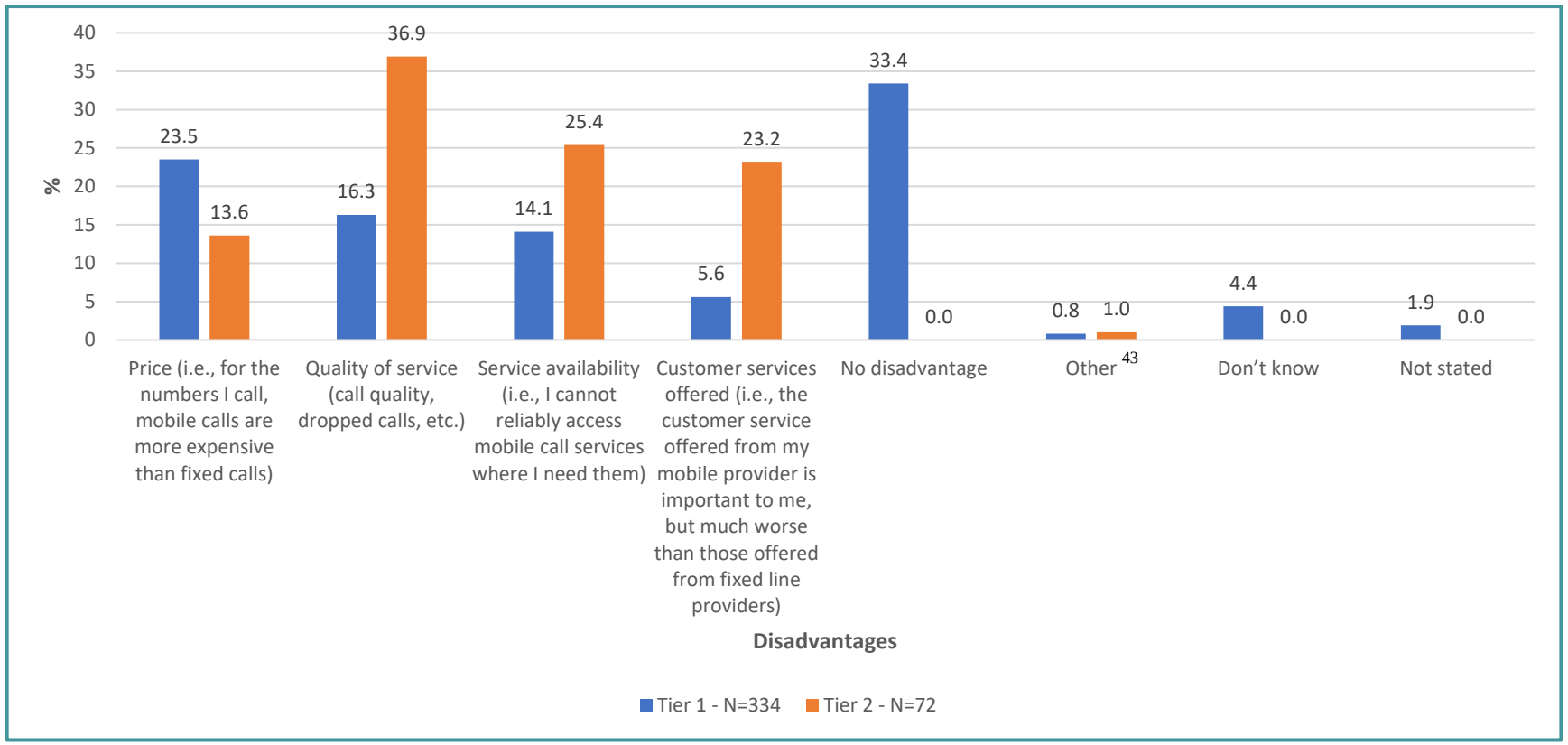


Figure 45. Ranking of key disadvantages of current mobile call plan compared to fixed landline service

[42]*Other option responses.*

[42] Four responses were provided in the "Other" category, i.e., mobile devices being easily damaged if dropped, exposure to radiation, expiration time on phone cards, and poor signal or "dead spots" in some locations.

In the first ranked tier, 33.4% of respondents selected “no disadvantage” when asked to rank their current mobile call plan compared to a fixed landline service. A further 23.5% stated price and 16.3% identified quality of service, as disadvantages of their current mobile plan when compared to a fixed landline service.

In terms of the second ranked disadvantages, not all respondents provided a second disadvantage as requested, resulting in 72 responses. In this tier, 36.9% of respondents indicated quality of service, 25.4% said service availability, and 23.2% selected customer service offered, as disadvantages of their current mobile plan when compared to a fixed landline service.

Figure 46 presents data on the ranking, in two tiers, of key the advantages of respondents' mobile call plan compared to OTT call services.

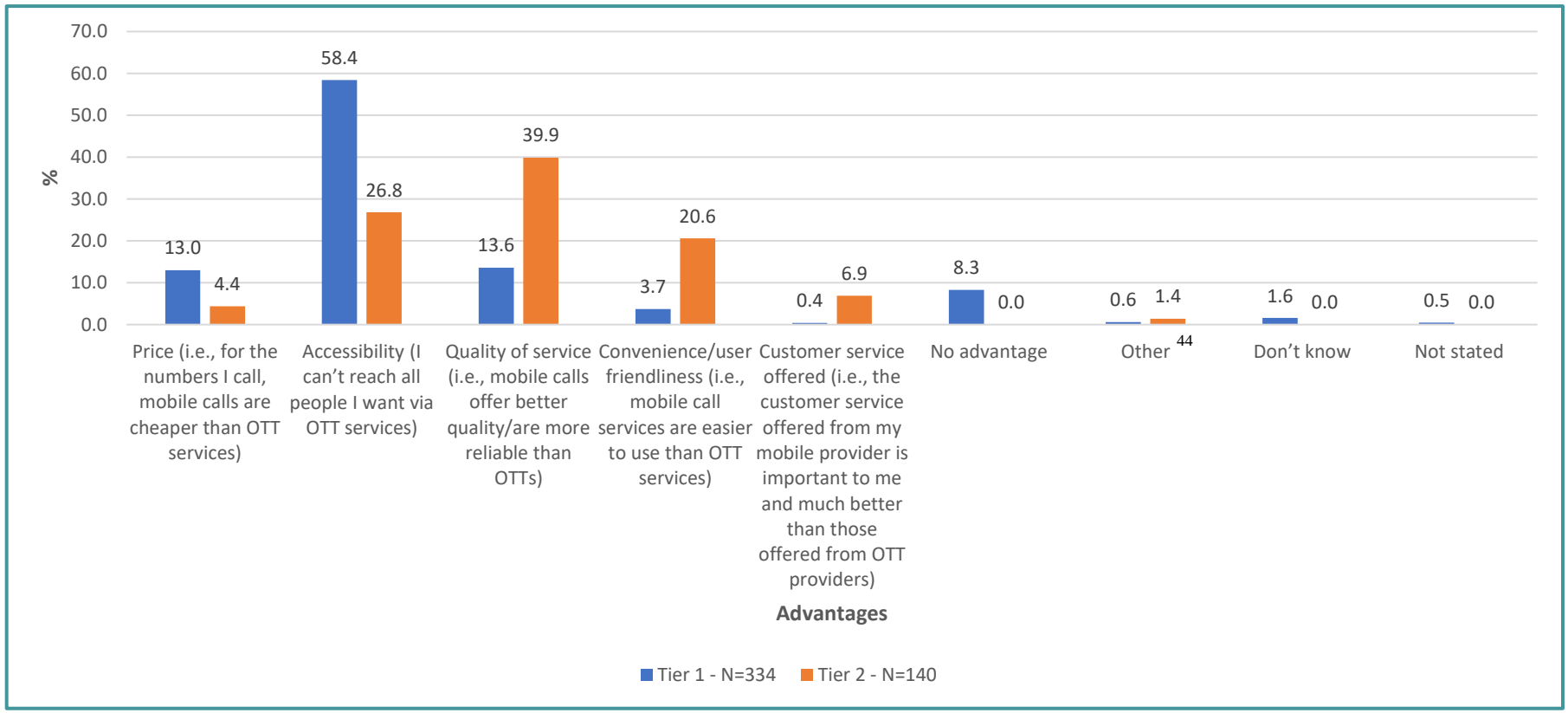


Figure 46. Ranking of key advantages of mobile call plan over OTT call services

[43]*Other option responses.*

[43] Four responses were received in the "Other" category, which included "does not require data", and "no data limit to worry about".

In the first ranked tier, 58.4% of respondents indicated that accessibility was an advantage of their mobile call plan when compared to OTT call services. Approximately 14% of respondents cited quality of service as an advantage, and 13% selected price.

In terms of the second ranked advantages, not all respondents provided a second advantage as requested, resulting in 140 responses in this tier, with 39.9% of respondents stating quality of service, 26.8% accessibility, and 20.6% convenience/user friendliness as advantages of their mobile call plan over OTT call services.

Figure 47 shows the ranking, in two tiers, of key disadvantages of respondents' mobile call plans compared to OTT call services.

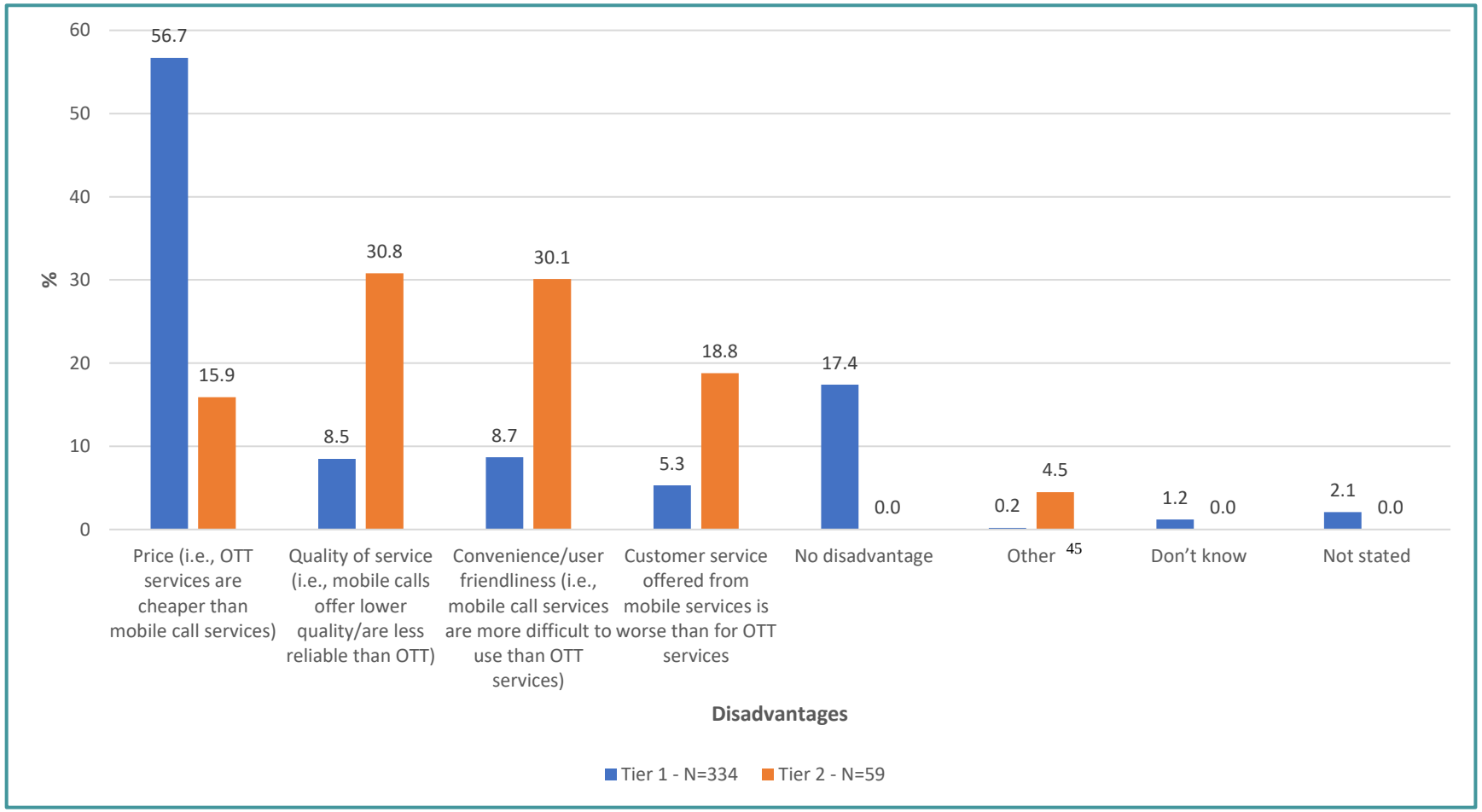


Figure 47. Ranking of two key disadvantages of mobile call plan compared to OTT call services

[44]*Other option responses.*

[44] Four responses were received in the "Other" category, which included calls dropping, depletion of funds on plan, and lack of video capability.

In the first ranked tier, 56.7% of respondents cited price as a disadvantage of their mobile call plan when compared to OTT call service. Approximately, 17% indicated that there were no disadvantages between their mobile call plan and OTT call services. Convenience/user friendliness and quality of service were selected by 8.7% and 8.5% of respondents, respectively.

In terms of the second ranked disadvantages, not all respondents provided a second disadvantage as requested, resulting in 59 responses in this tier, with 30.8% relating to quality of service, and 30.1% to convenience/user friendliness. Customer service and price were selected by 18.8% and 15.9% of respondents, respectively.

Figure 48 depicts the ranking, in two tiers, of key the advantages of respondents' text messaging (SMS/MMS) services when compared to OTT messaging services.

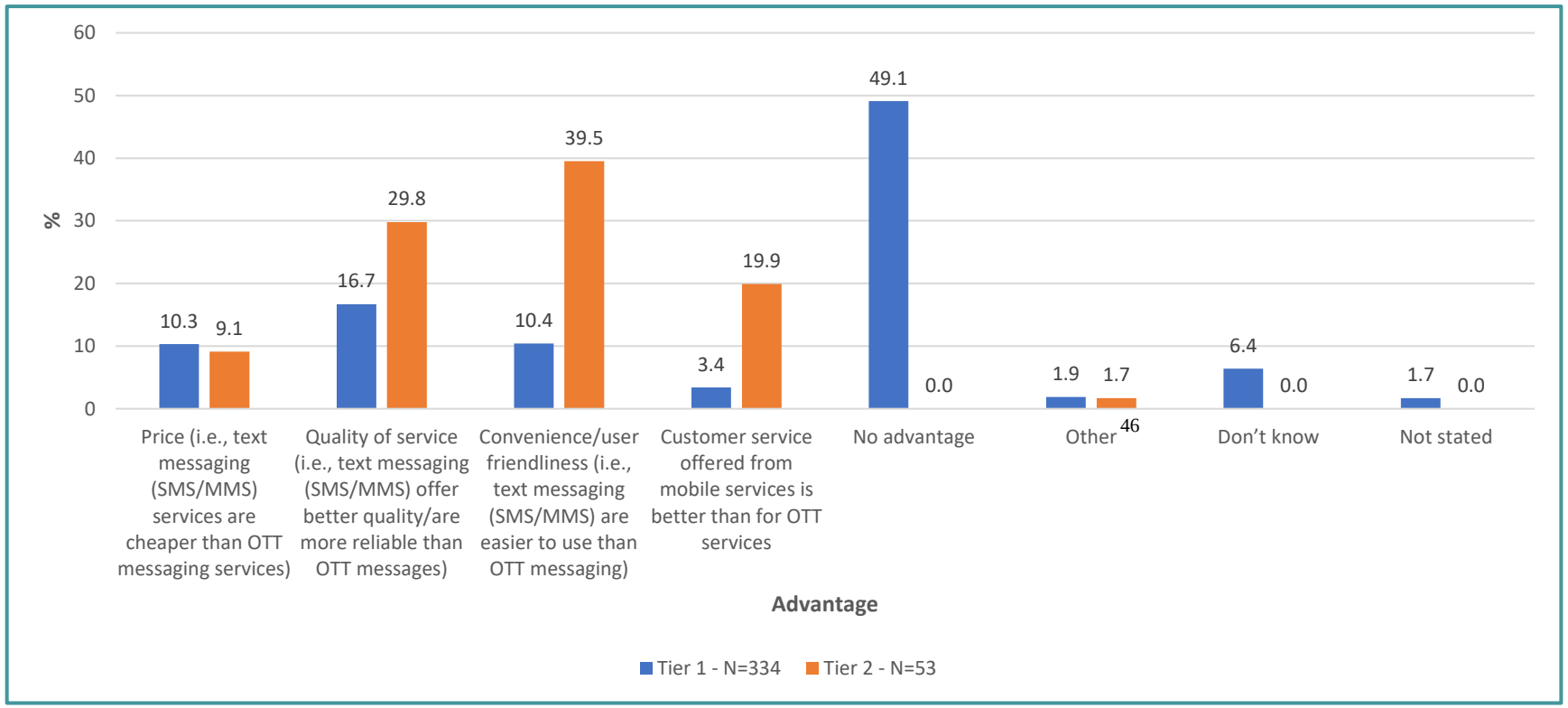


Figure 48. Ranking of key advantages of text messaging (SMS/MMS) services compared to OTT messaging services

[45]*Other option responses.*

[45] Eight responses were received in the "Oher" category, which included accessibility, delivery of message is guaranteed, more secure than OTT, and not everyone uses WhatsApp.

In the first ranked tier, 49.1% of respondents reported no advantage to text messaging (SMS/MMS) services compared to OTT messaging services. Another 16.7% stated quality of service, 10.4% identified convenience/user friendliness, and 10.3% cited price, as advantages of text messaging (SMS/MMS) services over OTT messaging services.

In terms of the second ranked advantages, not all respondents provided a second advantage as requested, resulting in 53 responses in this tier, with 39.5% selecting convenience/user friendliness, 29.8% quality of service, and 19.9% customer service offered, as advantages of text messaging (SMS/MMS) services compared to OTT messaging services.

Figure 49 presents the ranking, in two tiers, of the key disadvantages of respondents' text messaging (SMS/MMS) services compared to OTT messaging services.

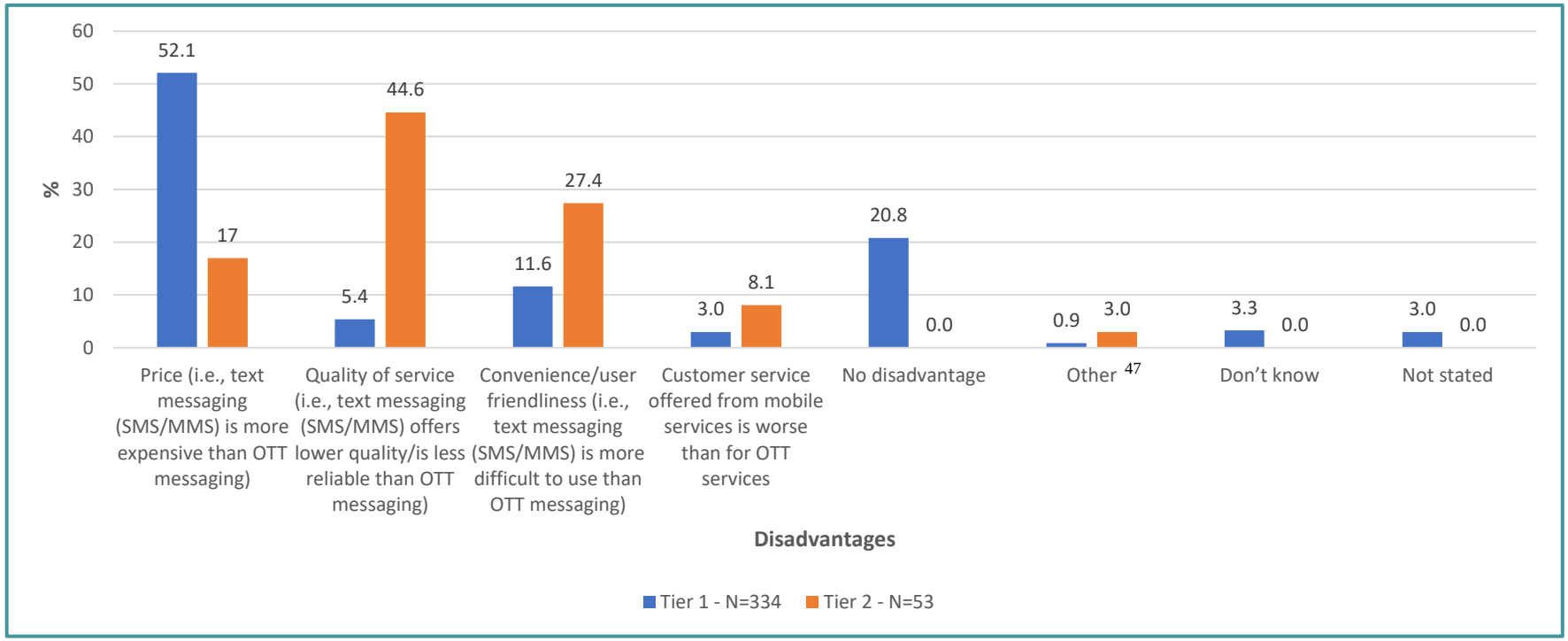


Figure 49. Ranking of disadvantages of text messaging (SMS/MMS) services compared to OTT messaging services

[46]*Other option responses.*

[46] Five responses were received in the "Other" category, which included "fewer persons using service so message is lost at times", "too much time required to type message", and "lack of audio and video capabilities".

In the first ranked tier, 52.1% of respondents selected price as a disadvantage of text messaging (SMS/MMS) services compared to OTT messaging services. Approximately 21% indicated that they could discern no disadvantage of text messaging (SMS/MMS) services compared to OTT messaging services, while 11.6% identified convenience/user friendliness.

In terms of the second ranked disadvantages, not all respondents provided a second disadvantage as requested, resulting in 53 responses. In this tier, 44.6% of respondents stated quality of service, 27.4% convenience/user friendliness, and 17% price, as disadvantages of text messaging (SMS/MMS) services compared to OTT messaging services.

3.4.2 Switching Considerations

Figure 50 presents data on whether, within the preceding six months, respondents had considered switching from their mobile plan/package to another plan.

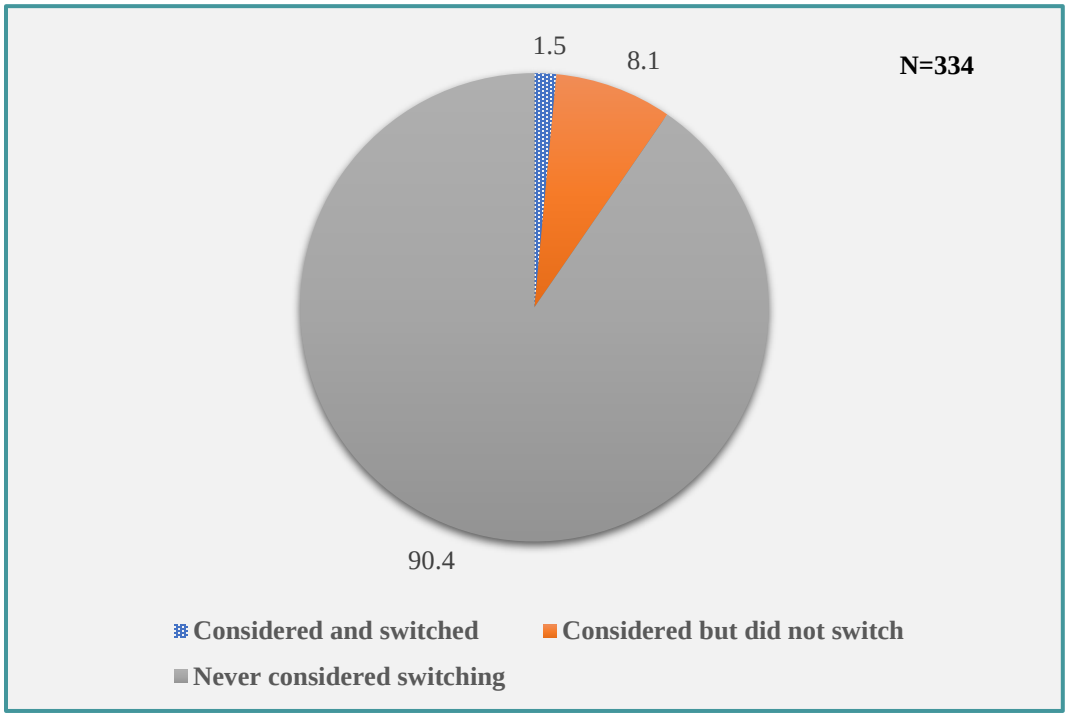


Figure 50. Within the preceding six months, considered switching mobile plans/packages

Approximately 90% of prepaid and postpaid respondents indicated that, within the preceding six months, they had never considered switching from their mobile plan/package to another plan. Respondents who considered but did not switch accounted for 8.1%, while 1.5% considered and switched to another plan.

Table 21 shows the switching pattern of respondents from current mobile plan/packages to other plans.

Table 21. Switching patterns from current mobile plan/package to another plan

Switching Pattern	%
I switched to a lower priced plan with my current provider	3
I switched to a lower priced plan with a new provider	1
I switched to a higher priced plan with a new provider	1
Total	**5**

N=5 – Represents respondents who selected "Considered and switched", as seen in Figure 50.

Five respondents to the survey reported that they had switched from their current mobile plan/package to another. Three of the five had switched to a lower priced plan with their current provider, while one had switched to a lower priced plan with a new provider, and one to a higher priced plan with a new provider.

Figure 51 breaks down by percentage respondents' reasons for not switching from their current mobile call plan/package to a new one.

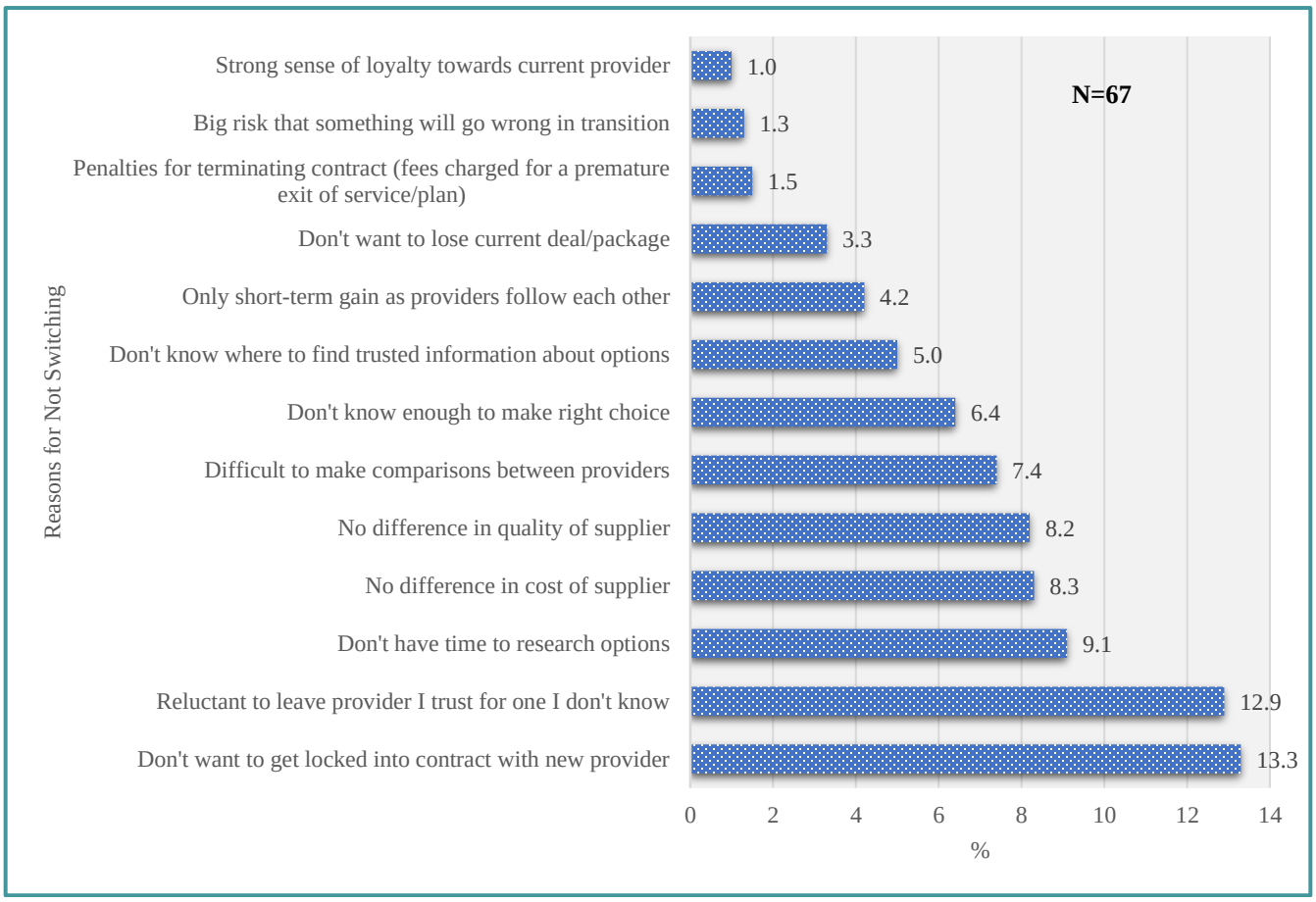


Figure 51. Respondents' reasons for not switching from current mobile call plan/package to a new plan

When asked to provide reasons for not switching from their current mobile call plan/package to a new one, 13.3% of respondents, representing the 67 who had considered switching but did not, indicated that they did not want to get locked into a contract with a new provider. Approximately 13% cited their reluctance to leave the provider they trusted for one they did not know.

"No difference in price of supplier" and "no difference in quality of supplier" were selected by 8.3% and 8.2% of respondents, respectively. A strong sense of loyalty towards their current provider accounted for 1% of all respondents.

3.5 Demand For and Usage of MiFi (Mobile Data Only) Services

Thirty-two respondents, representing 3.2% of the sample, reported that they subscribed to MiFi (mobile data only) services.

Figure 52 illustrates, by percentage, the types of MiFi (mobile data only) services plans currently subscribed to.

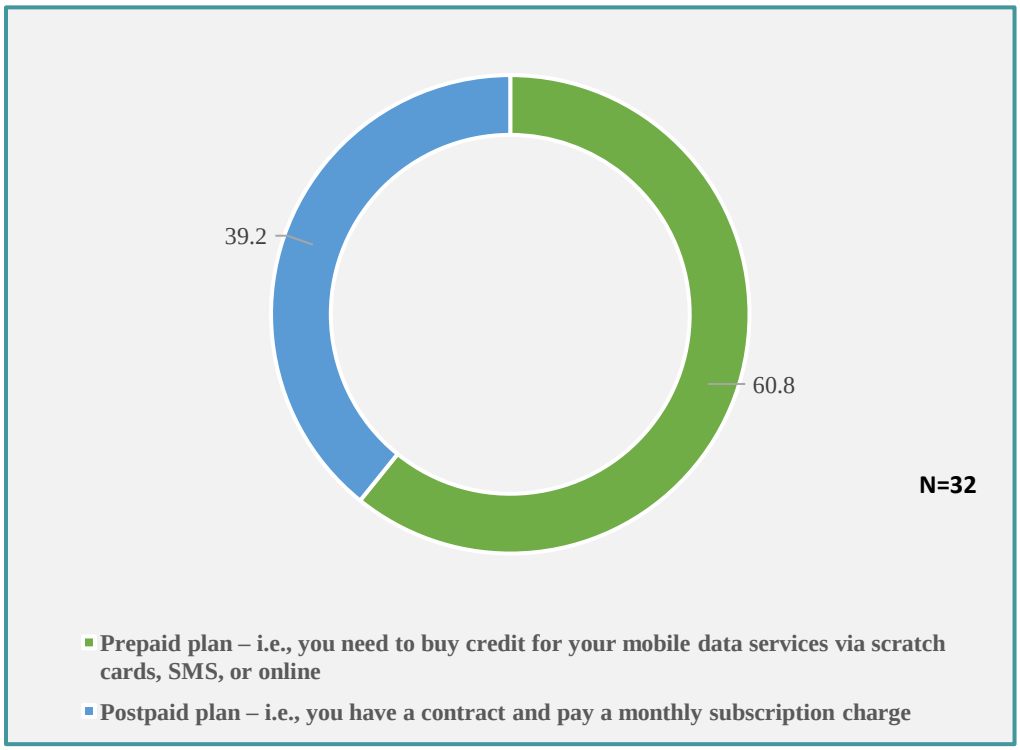


Figure 52. Type of MiFi (mobile data only) services plan currently subscribed to

When asked about the MiFi (mobile data only) services plan they were currently subscribed to, 60.8% of respondents said they subscribed to a prepaid plan, while 39.2% subscribed to a postpaid plan.

Figure 53 depicts the use of MiFi (mobile data only) service as the only way for respondents to access the Internet.

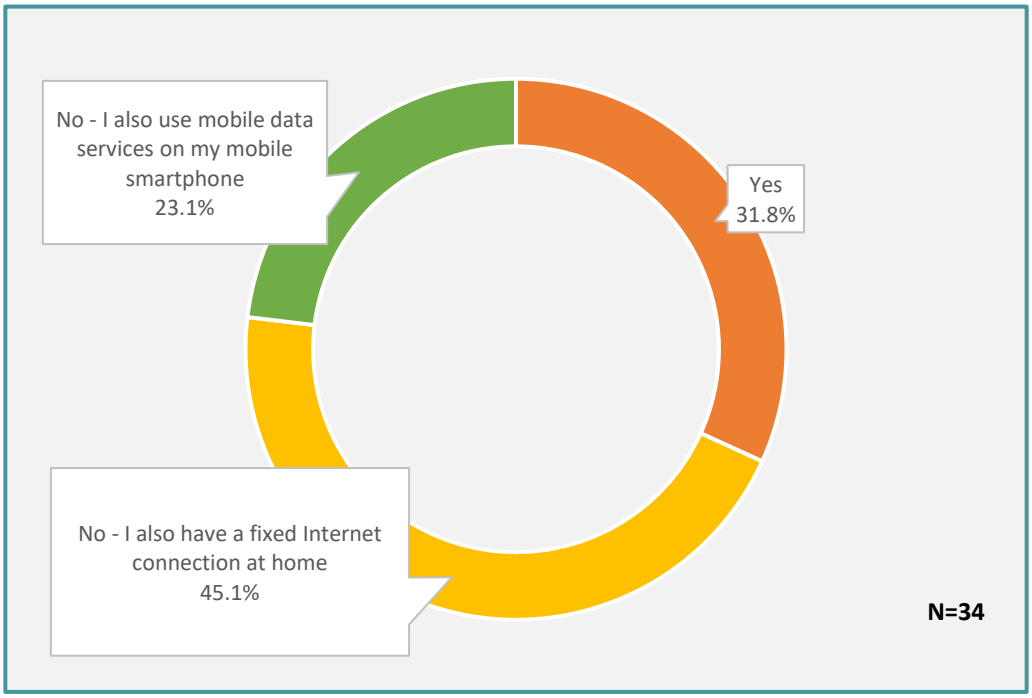


Figure 53. Use MiFi (mobile data only) service as the only way to access Internet

There was a total of 34 responses to this question because it was a multiple response question. Approximately 45% of the respondents used their fixed Internet connection at home to access the Internet in addition to their MiFi service. Respondents who used MiFi service as the only way to access the Internet accounted for 31.8%, while those who also used the mobile data services on their mobile smartphone, in addition to MiFi services, accounted for 23.1%.

Table 22 shows the actions to be taken by respondents if the cost of their MiFi (mobile data only) plan increased.

Table 22. Action taken if the cost of MiFi (mobile data only) plan increased

Monthly Expenditure TT$	**$100–$199**		**$200–$299**		**$300–$399**	
Proposed Price Increase TT$	**$5–$10**		**$10–$15**		**$15–$20**	
Action To Be Taken	**%**	**N**	**%**	**N**	**%**	**N**
Stop using MiFi mobile data service altogether	0.0	0	0.0	0	10.1	2
Switch to another mobile MiFi plan	0.0	0	0.0	0	0.0	0
Switch to accessing the Internet and emails via mobile data	47.1	1	35.9	4	45.6	8
Switch to or use a fixed Internet service	0.0	0	0.0	0	0.0	0
Do nothing	52.9	1	53.3	6	21.6	4
Don’t know	0.0	0	10.7	1	11.7	2
Not stated	0.0	0	0.0	0	11.0	2
Total	**100.0**	**2**	**100.0**	**11**	**100.0**	**18**

With a proposed price increase of $5 to $10, 52.9% of respondents would do nothing in reaction to the increase. A further 47.1% of respondents would switch to accessing the Internet and emails via mobile data.

With a proposed price increase of $10 to $15, 53.3% of respondents would do nothing, while 35.9% would switch to accessing the Internet and emails via mobile data. Approximately, 11% of respondents indicated that they did not know what their reaction would be.

In response to a proposed increase of $15 to $20, 45.6% of respondents indicated that they would switch to accessing the Internet and emails via mobile data; 21.6% would do nothing; and 10.1% would stop using MiFi mobile data service altogether. Respondents who did not know what action they would take or did not state any action accounted for 11.7% and 11%, respectively.

Figure 54 presents, by percentage, the reasons respondents gave for doing nothing if their mobile service provider increased the cost of their MiFi (mobile data only) service.

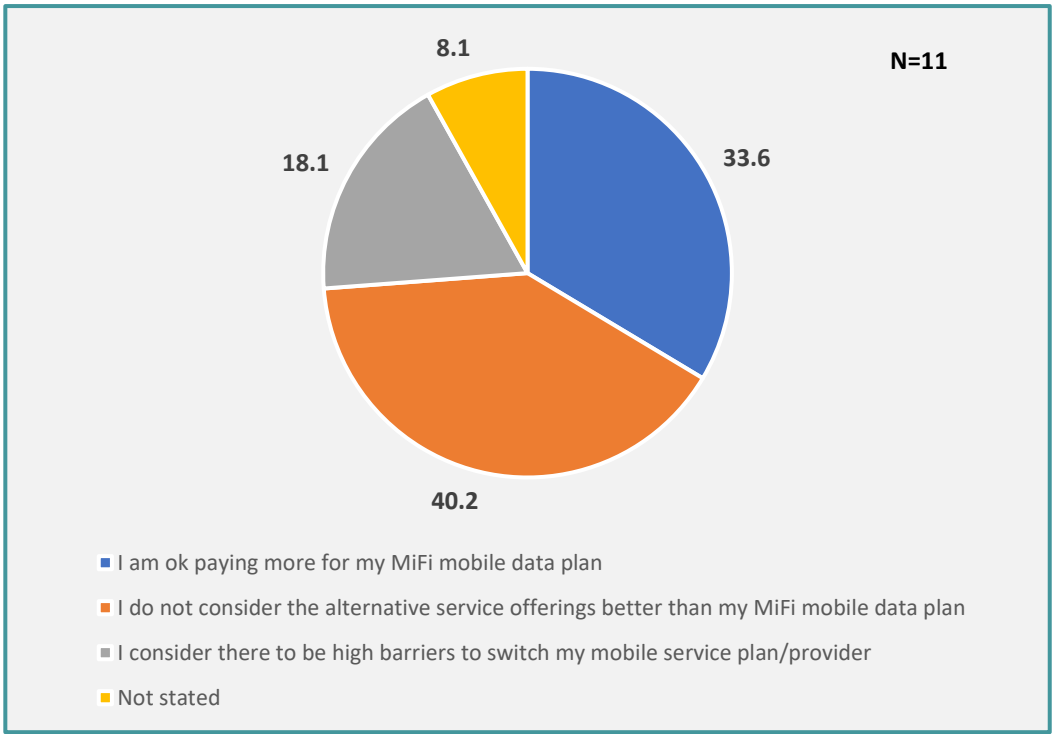


Figure 54. Reasons for doing nothing if mobile service provider increased the cost of MiFi (mobile data only) service

Of the 1147 respondents who indicated that they would do nothing if the cost of their MiFi service increased, 40.2% said that they did not consider the alternative service offerings to be better than their MiFi mobile data plan. A further 33.6% of respondents indicated that they were okay with paying more for their MiFi mobile data plan.

Approximately 18% of respondents did nothing because they considered there to be high barriers to switching their mobile service plan/provider, while a further 8.1% of respondents did not state their reason for doing nothing in response to an increase in the cost of their MiFi (mobile data only) plan.

[47] N=11 represents respondents who selected do nothing, as shown in Table 22.

Figure 55 depicts the ranking, in two tiers, of the key advantages of respondents' MiFi (mobile data only) plan compared to a fixed broadband Internet plan.

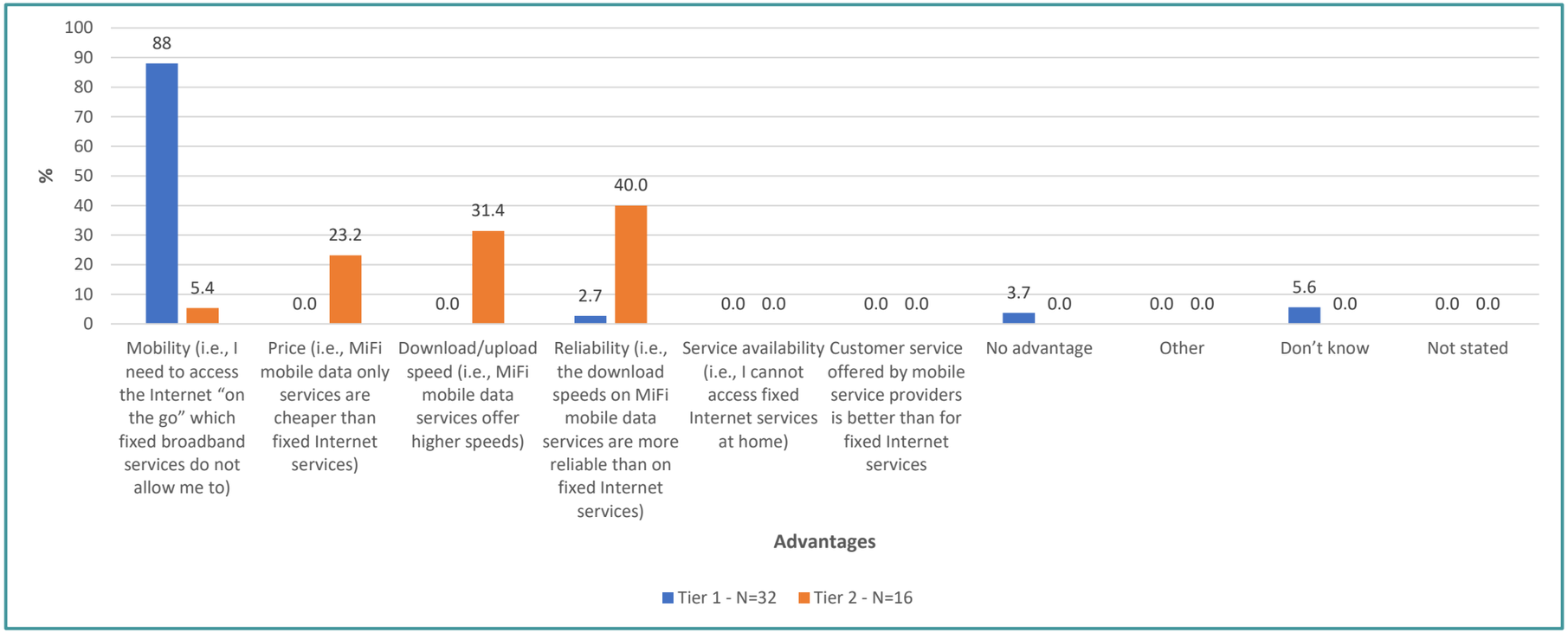


Figure 55. Ranking of key advantages of MiFi (mobile data only) plan over a fixed broadband Internet plan

In the first ranked tier, 88% of all respondents selected mobility as an advantage of their MiFi (mobile data only) plan compared to a fixed broadband Internet plan. Approximately 4% of all respondents indicated that there was no advantage between the two plans, while 5.6% could not identify any advantage.

In terms of the second ranked advantages, not all respondents provided a second advantage as requested, resulting in 16 responses in this tier, with 40% of those respondents selecting reliability, 31.4% stating download/upload speed, and 23.2% price, as advantages of their MiFi plan over a fixed broadband Internet plan.

Figure 56 shows the ranking, in two tiers, of the key disadvantages of respondents' MiFi (mobile data only) plan compared to a fixed broadband Internet plan.

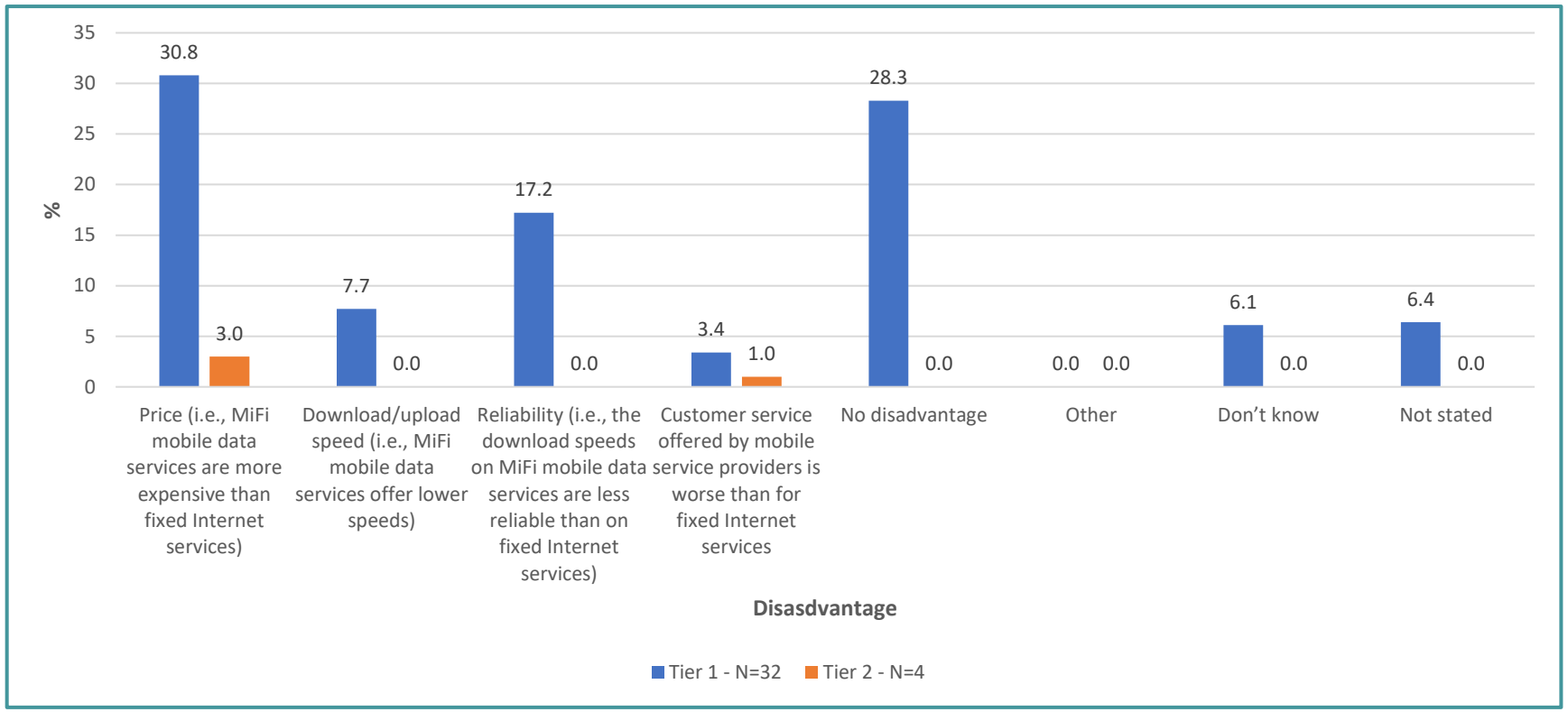


Figure 56. Ranking of the disadvantages of a MiFi (mobile data only) plan compared to a fixed broadband Internet plan

In the first ranked tier, 30.8% of respondents selected price as a disadvantage of their MiFi (mobile data only) plan when compared to a fixed broadband Internet plan. Approximately 28% indicated that there was no disadvantage when comparing the two options, while 17.2% said reliability.

In terms of the second ranked disadvantages, not all respondents provided a second disadvantage as requested, resulting in four responses in this tier. Three of the four respondents selected price as the main disadvantage of their MiFi (mobile data only) plan compared to a fixed broadband Internet plan.

3.6 Demand For and Usage of OTT Call and Messaging Services

Figure 57 illustrates, by percentages, the types of mobile devices used for OTT calling and messaging.

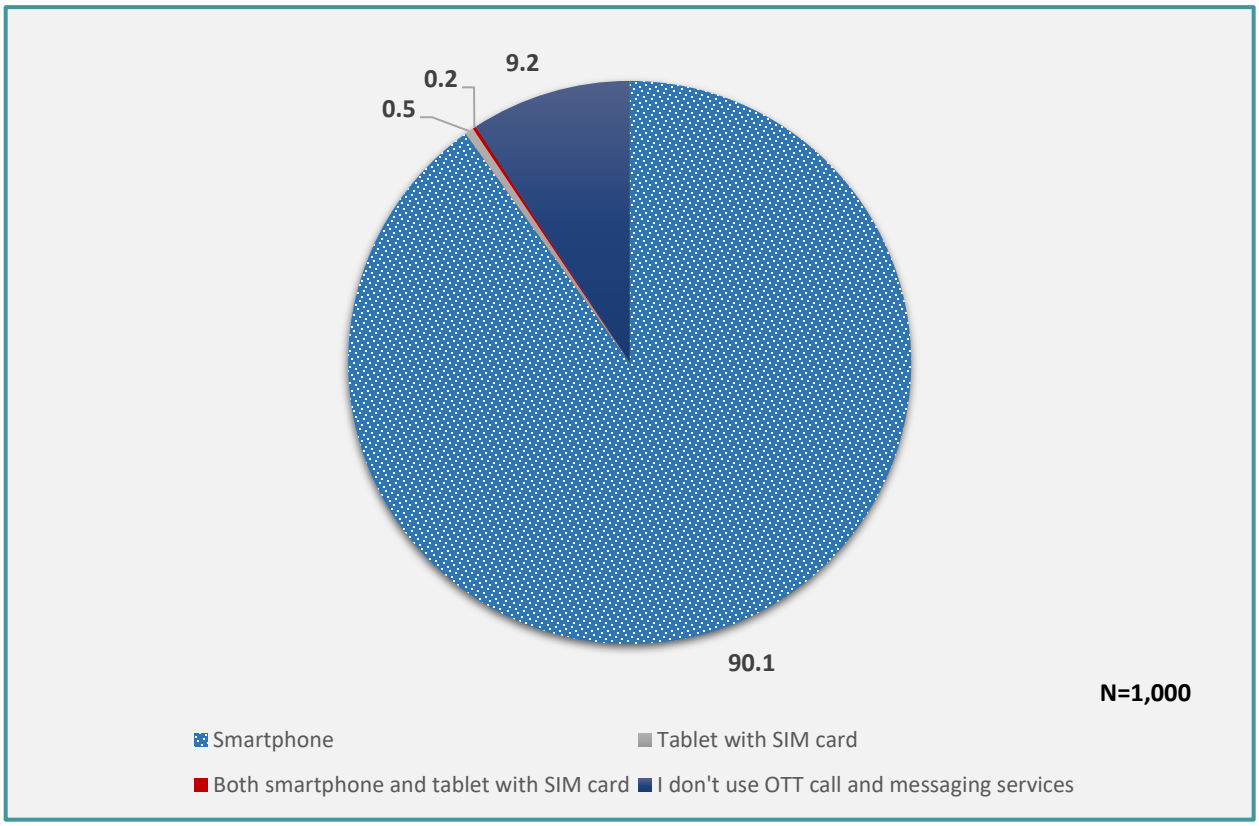


Figure 57. Types of mobile devices used for OTT calling and messaging

When asked about the type(s) of mobile devices they used for OTT calling and messaging, 90.1% of respondents said they used a mobile smartphone. Respondents who did not use OTT call and messaging services accounted for 9.2% of respondents, while 0.5% reported that they used a tablet with a SIM card. Another 0.2% of respondents used both a mobile smartphone and a tablet with a SIM card.

Figure 58 presents data on the OTT application(s) used on mobile devices.

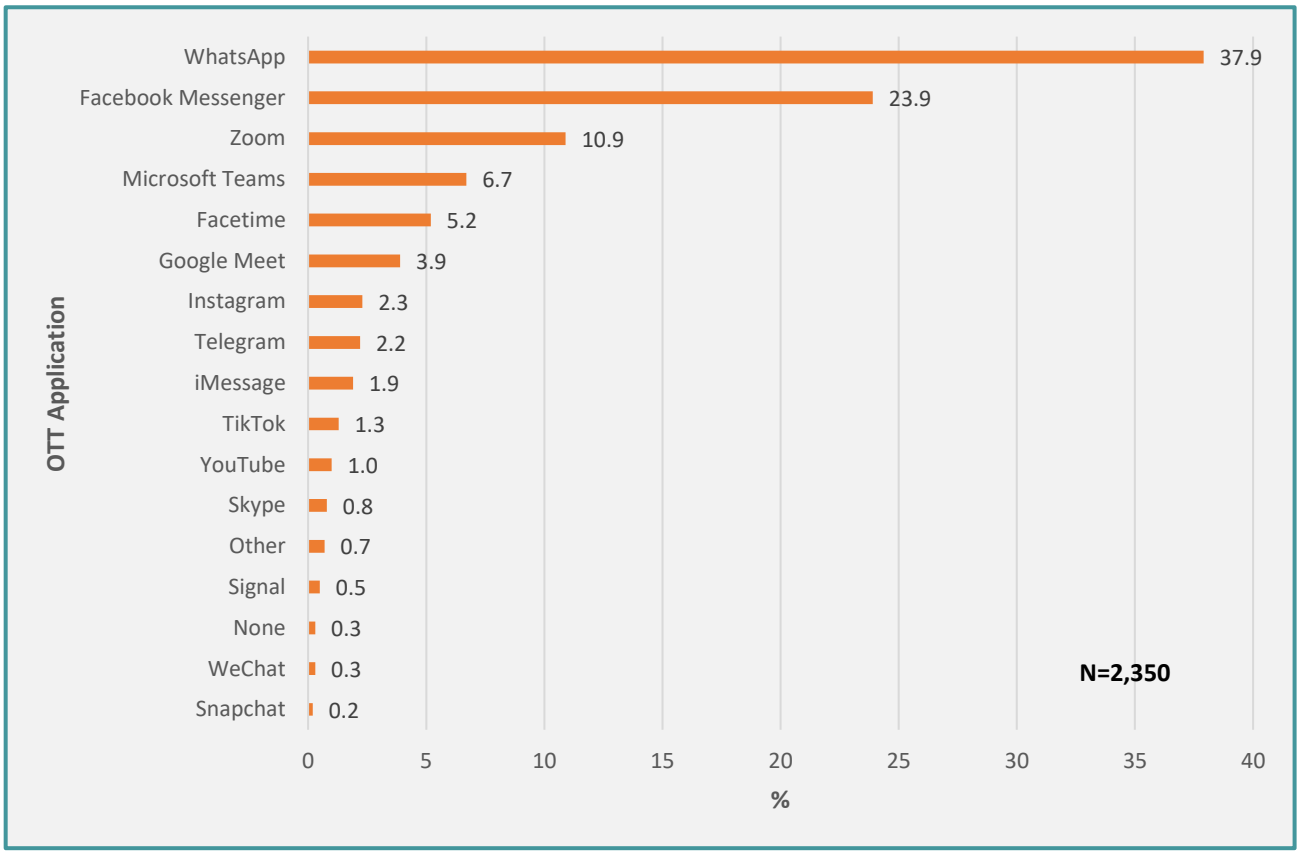


Figure 58. OTT application(s) used on mobile devices

Respondents were asked which OTT application were used on their mobile devices. A total of 2,350 responses were received given that the question was multiple response in nature, allowing respondents to select several options.

Based on the responses provided, WhatsApp accounts for 37.9% of OTT application usage, Facebook Messenger for 23.9%, Zoom 10.9%, and Microsoft Teams 5.2%.

Snapchat, WeChat and Signal were reported to be the three least used OTT applications and accounted for 0.2%, 0.3% and 0.5% usage, respectively.

Respondents who did not use any OTT applications accounted for 0.3% of all respondents.

Figure 59 gives details on the purposes respondents cited for using OTT application(s) on mobile devices.

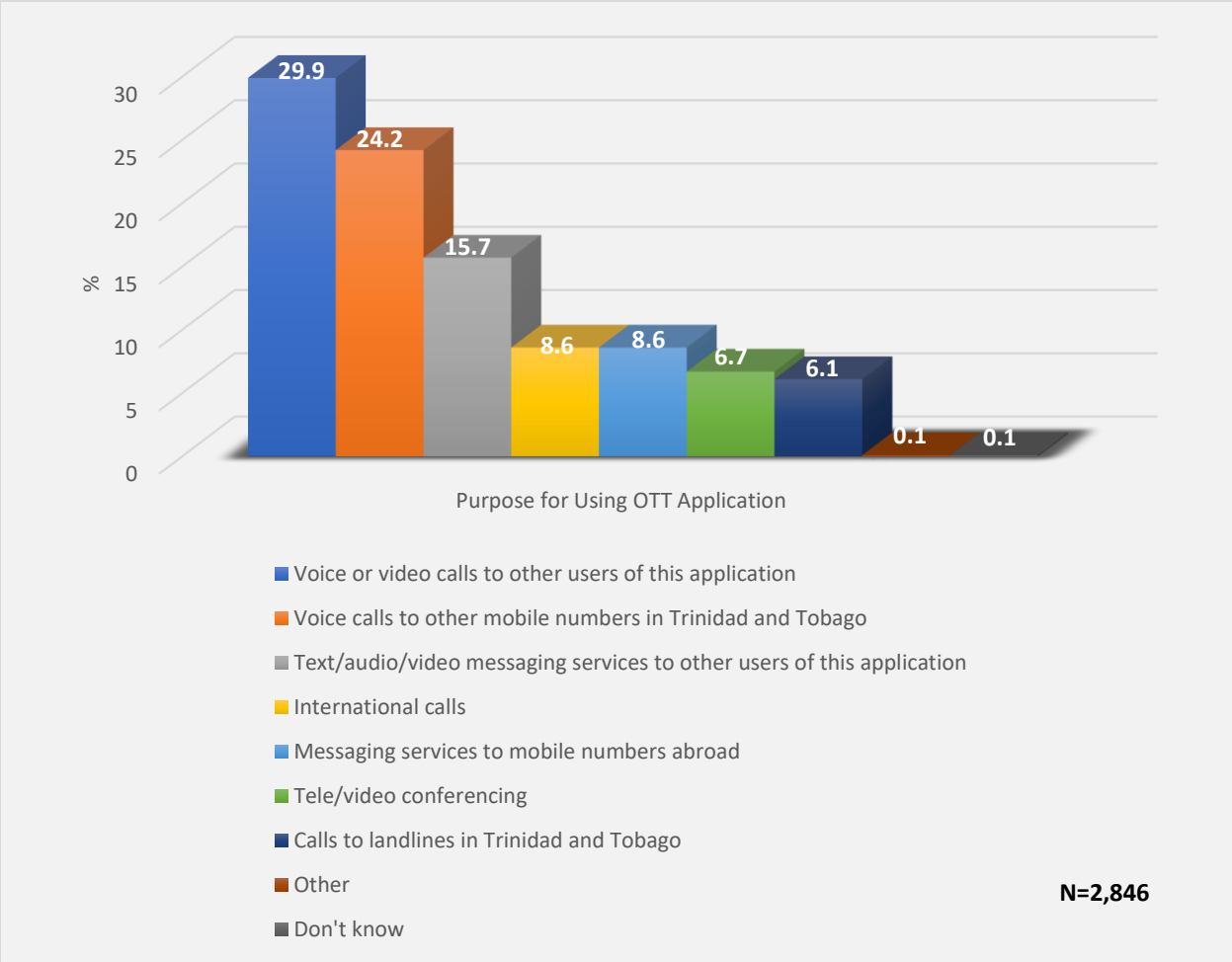


Figure 59. Purpose for using OTT application(s) on mobile devices (smartphone/tablet)

With respect to the purpose for using OTT application on their mobile device, a total of 29.9% of respondents indicated that they used OTT applications for voice or video calls to other users of the same application. A further 24.2% said they used OTT application for voice calls to other mobile numbers in Trinidad and Tobago, while 15.7% used the applications for text/audio/video messaging services to other users of the same applications.

International call and messaging services to mobile numbers abroad both accounted for 8.6% of responses, while tele/video conferencing and calls to landlines in Trinidad and Tobago accounted for 6.7% and 6.1% of responses. Respondents who identified other purposes, or did not know of any purpose, both accounted for 0.1% of all respondents.

Figure 60 presents data on the number of minutes spent weekly on domestic voice calls made using OTT application(s).

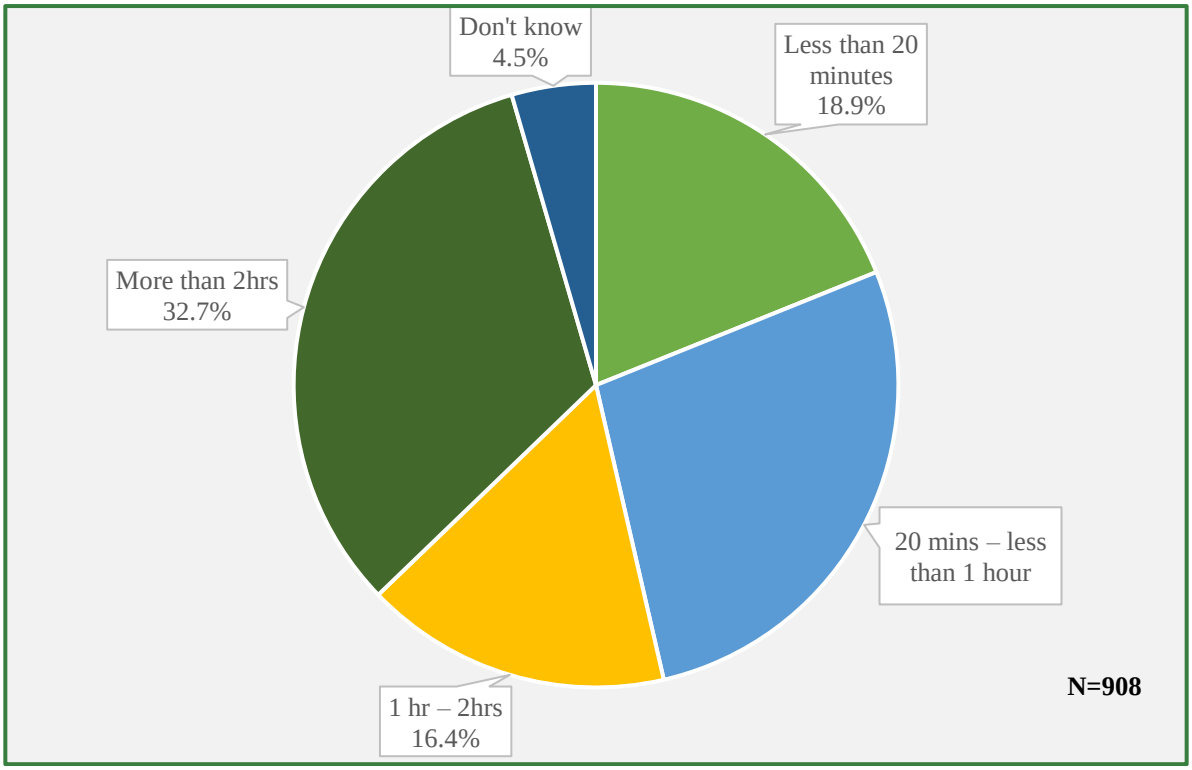


Figure 60. Number of minutes spent weekly on domestic voice calls made using OTT application(s)

When the 908 users of OTT applications were asked about the number of minutes spent weekly on domestic voice calls made using such applications, 32.7% of them indicated that they spent more than two hours; 27.5% spent 20 minutes to less than one hour; 18.9% spent less than 20 minutes; and 16.4% spent one to two hours. Approximately 5% of all respondents did not know how many minutes they spent.

Figure 61 shows the frequency of use of OTT applications.

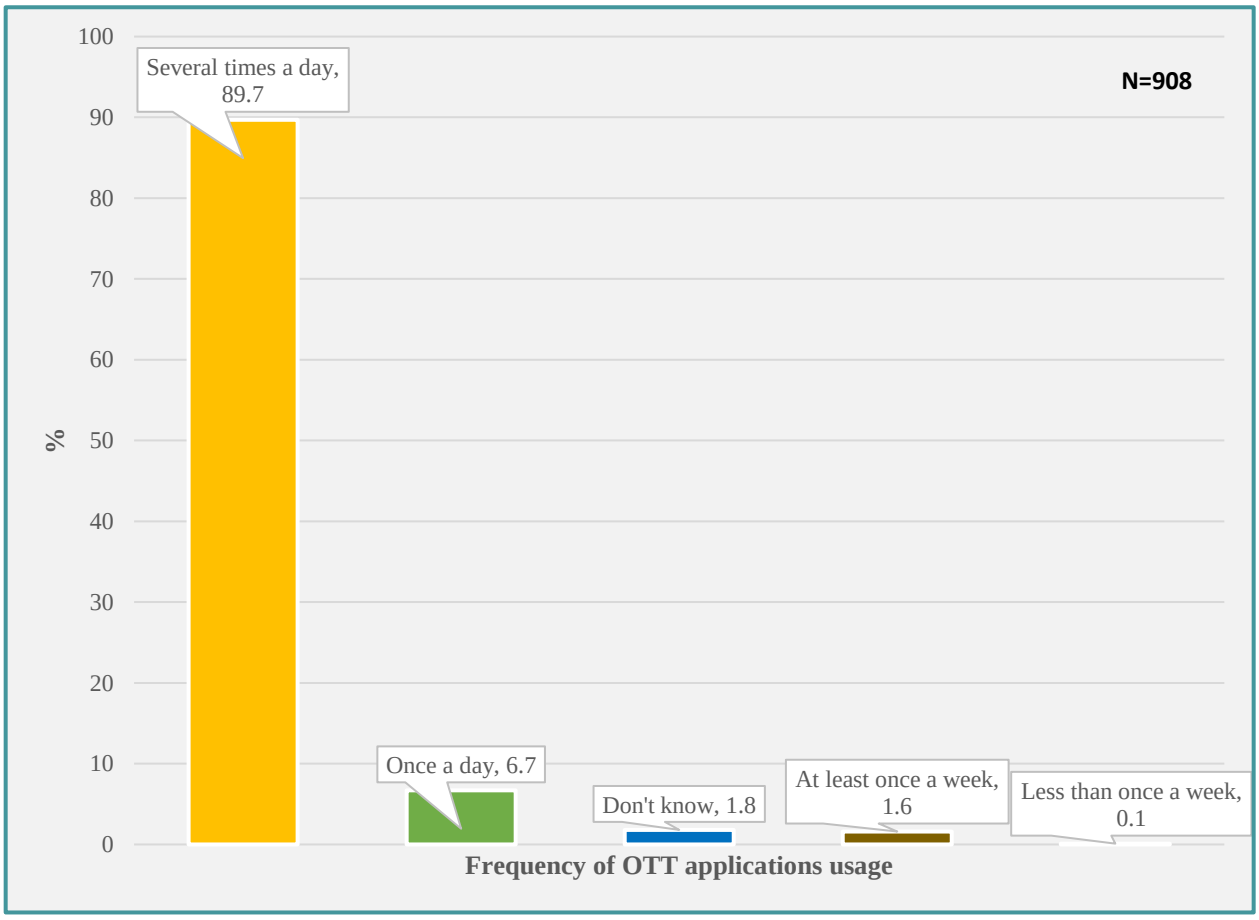


Figure 61. Frequency of use of OTT applications

The majority of respondents, 89.7%, indicated that they used the applications several times a day, while 6.7% stated they used them once a day.

Approximately 2% said they used OTT applications at least once a week; 0.1% used them less than once a week; and 1.8% indicated that they did not know the frequency of their use.

Figure 62 illustrates, by percentage, the volume of OTT messages sent daily.

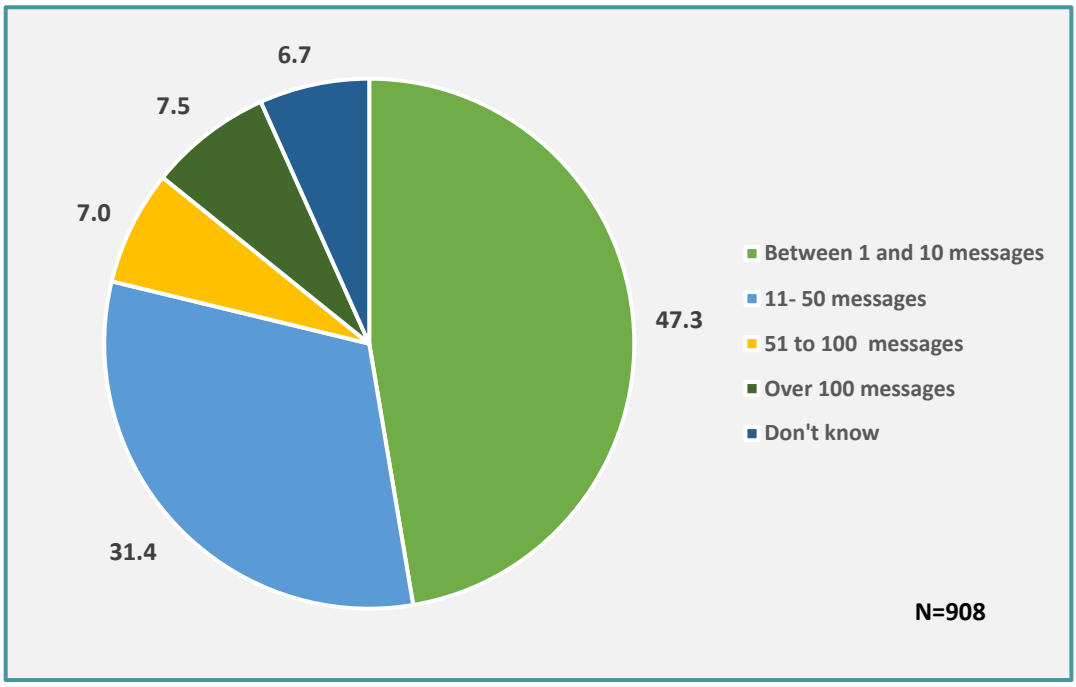


Figure 62. Number of OTT messages sent daily

The percentage of respondents who sent between 1 and 10 OTT messages daily was 47.3%, while 31.4% sent between 11 and 50 messages. Approximately 8% sent over 100 messages; 7% sent 51 to 100; and 6.7% did not know how many messages they sent daily.

Figure 63 depicts the number of OTT messages respondents received daily.

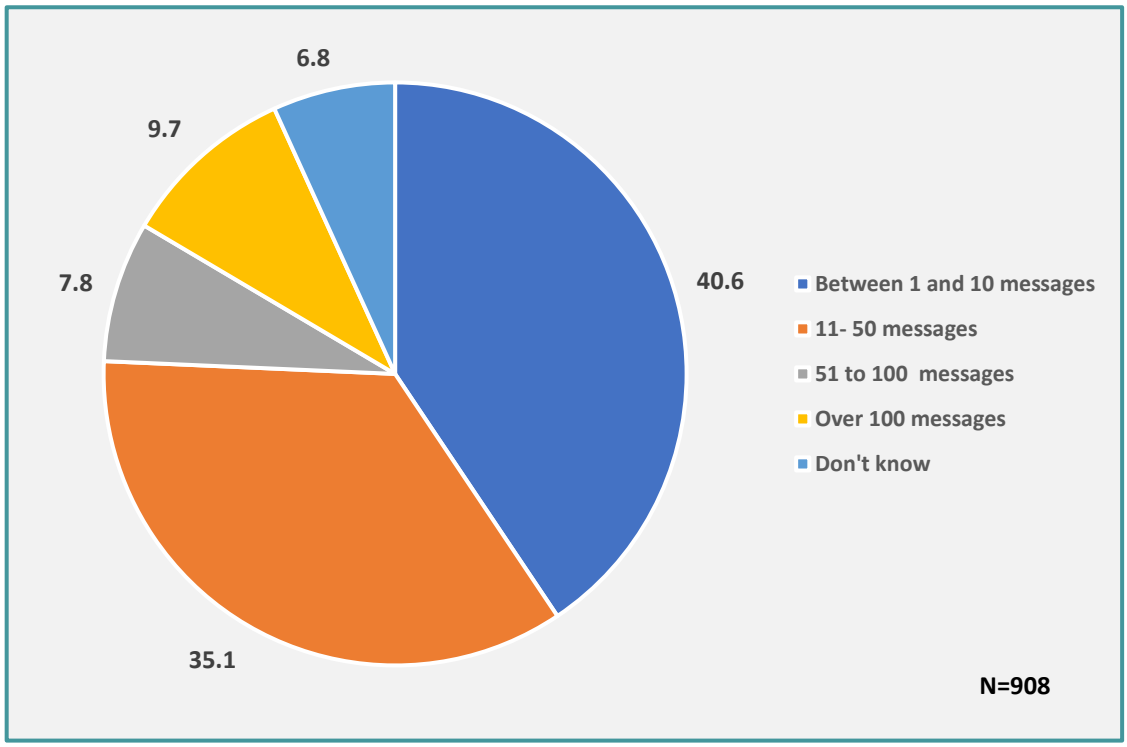


Figure 63. Number of OTT messages received daily

Close to 41% of respondents indicated that they received between 1 and 10 OTT messages daily; 35.1% said they received 11 to 50 OTT messages; 9.7% received over 100 messages; and 7.8% received 51 to 100. Approximately 7% of respondents did not know how many messages they received daily.

Figure 64 presents data on whether OTT call and/or messaging services affected respondents' use of mobile services.

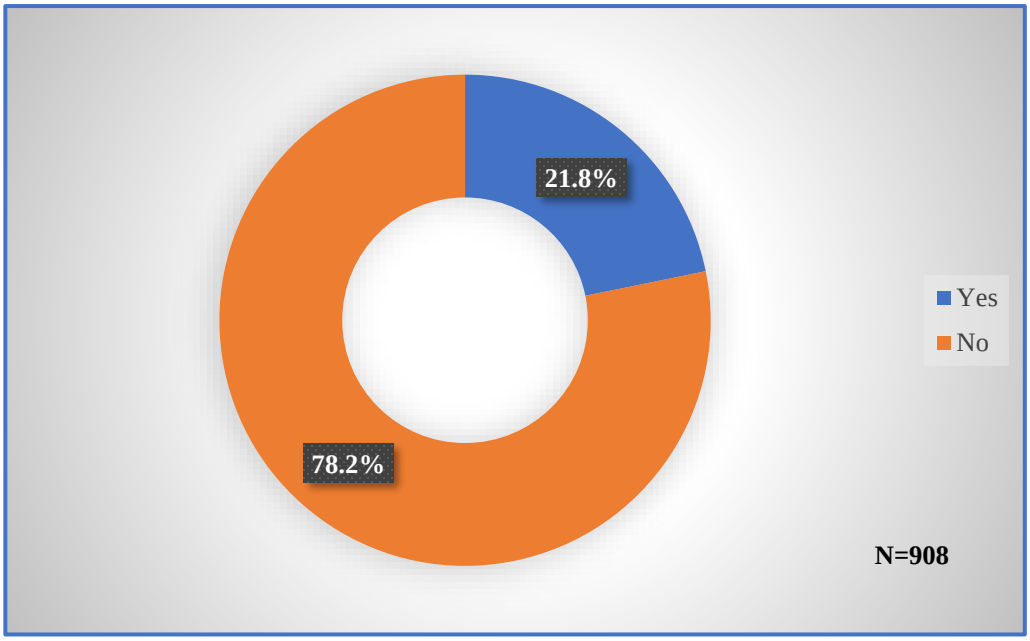


Figure 64. If OTT call and/or messaging services affected use of mobile services

Of the respondents who were asked whether their OTT call and/or messaging services affected their use of mobile services, the majority, 78.2%, replied in the affirmative, while 21.8% indicated that OTT services did not affect their usage of mobile services.

Figure 65 gives details on the ways in which the adoption of OTT call and messaging services affected respondents' usage of mobile services.

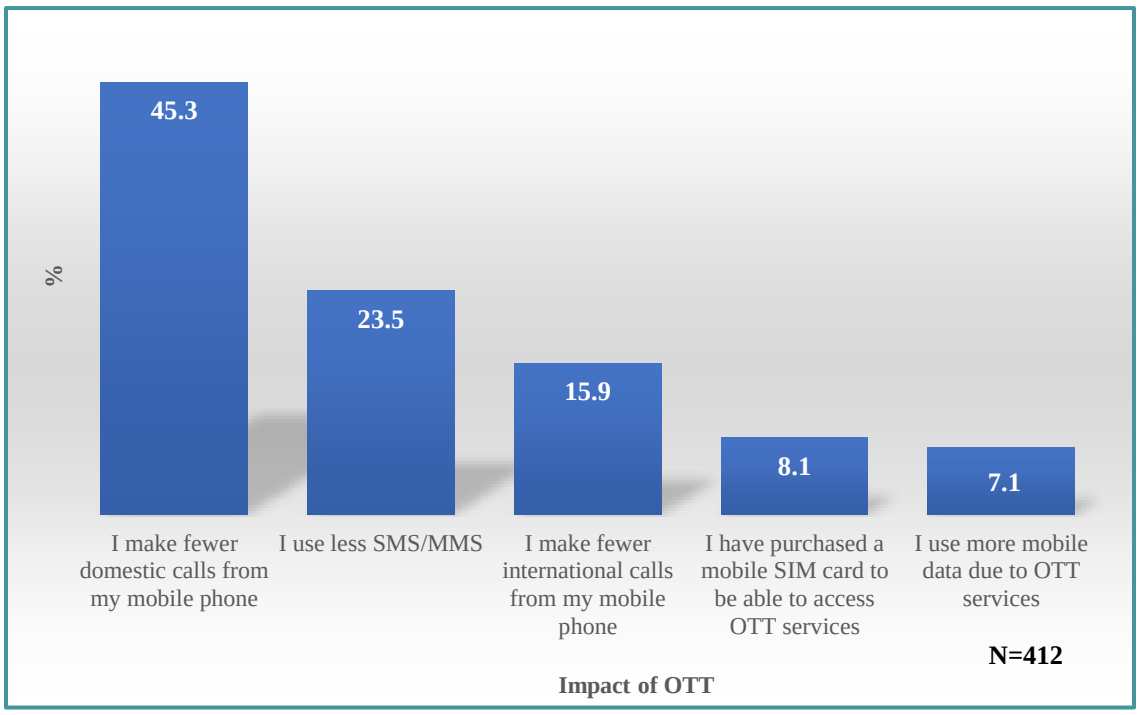


Figure 65. Ways in which adoption of OTT call and messaging services affected usage of mobile services

When asked about the ways in which the adoption of OTT call and/or messaging services had affected their use of mobile services, 45.3% of respondents said they made fewer calls from their mobile phone; 23.5% indicated using SMS/MMS less; 15.9% stated they made fewer international calls from their mobile phone.

Respondents who purchased a mobile SIM card to be able to access OTT services accounted for 8.1% of responses; and 7.1% of respondents indicated they used more mobile data due to OTT services.

3.7 Competitive Dynamics of the Mobile Market

Figure 66 shows the data on switching vis-à-vis respondents and their mobile service providers in the preceding two years.

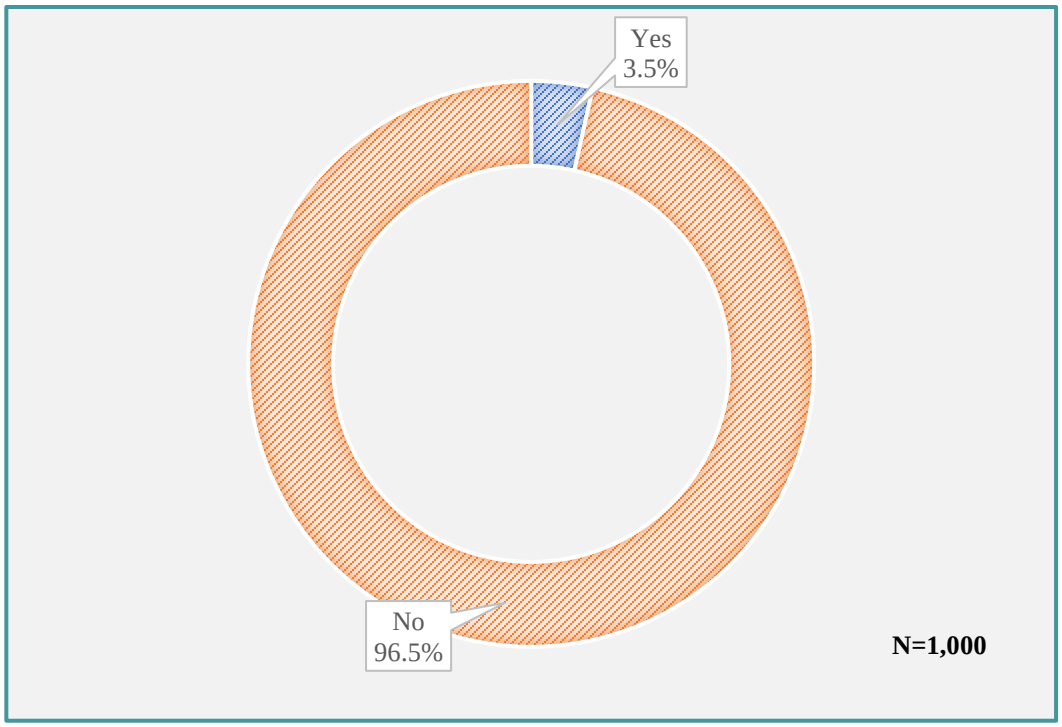


Figure 66. Respondents' switching mobile service providers in the previous two years

Approximately 97% of respondents indicated that they had not switched mobile service providers in the preceding two years, while 3.5% stated that they had switched.

Figure 67 presents data on respondents' previous mobile service provider prior to switching within the preceding two years.

Figure 67. Respondents' previous mobile service provider

Figure 68 gives details on the mobile plans respondents had subscribed to with their previous mobile provider.

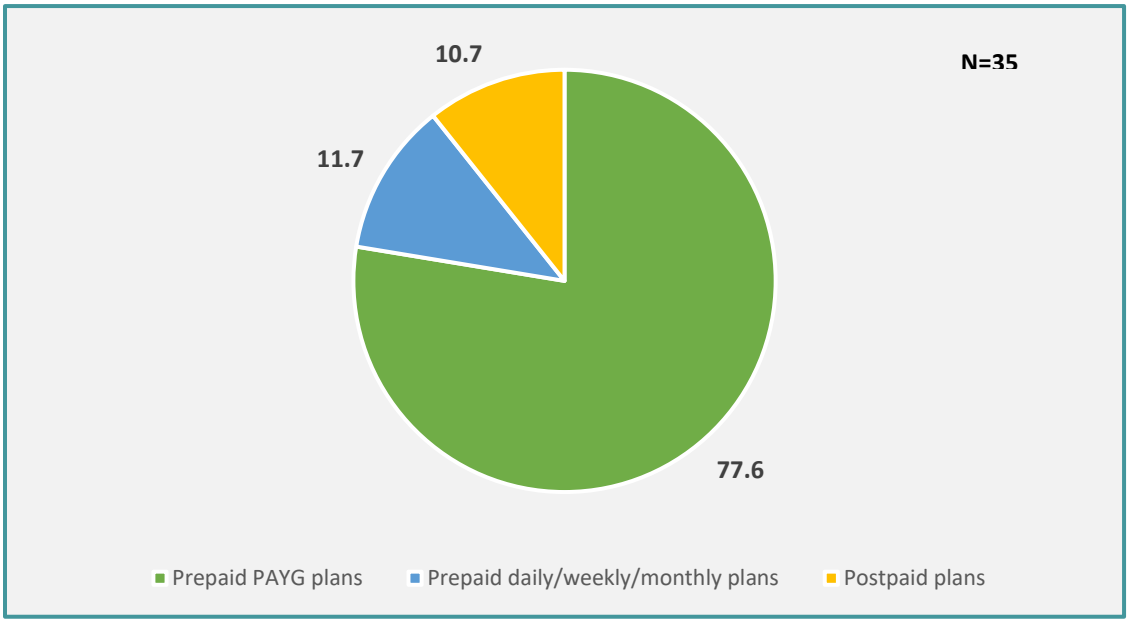


Figure 68. Mobile plans subscribed to with previous mobile provider

Almost 78% the of 36[48] responses received showed that prepaid PAYG plans were the mobile plans subscribed to, while prepaid daily/weekly/monthly plans and postpaid plans accounted for 11.7% and 10.7% of responses received, respectively.

[48] N=36 represents total responses received from respondents who selected yes, shown in Figure 66. One additional response is added because the question is multiple response.

Figure 69 presents data on the main reason for respondents switching mobile service providers.

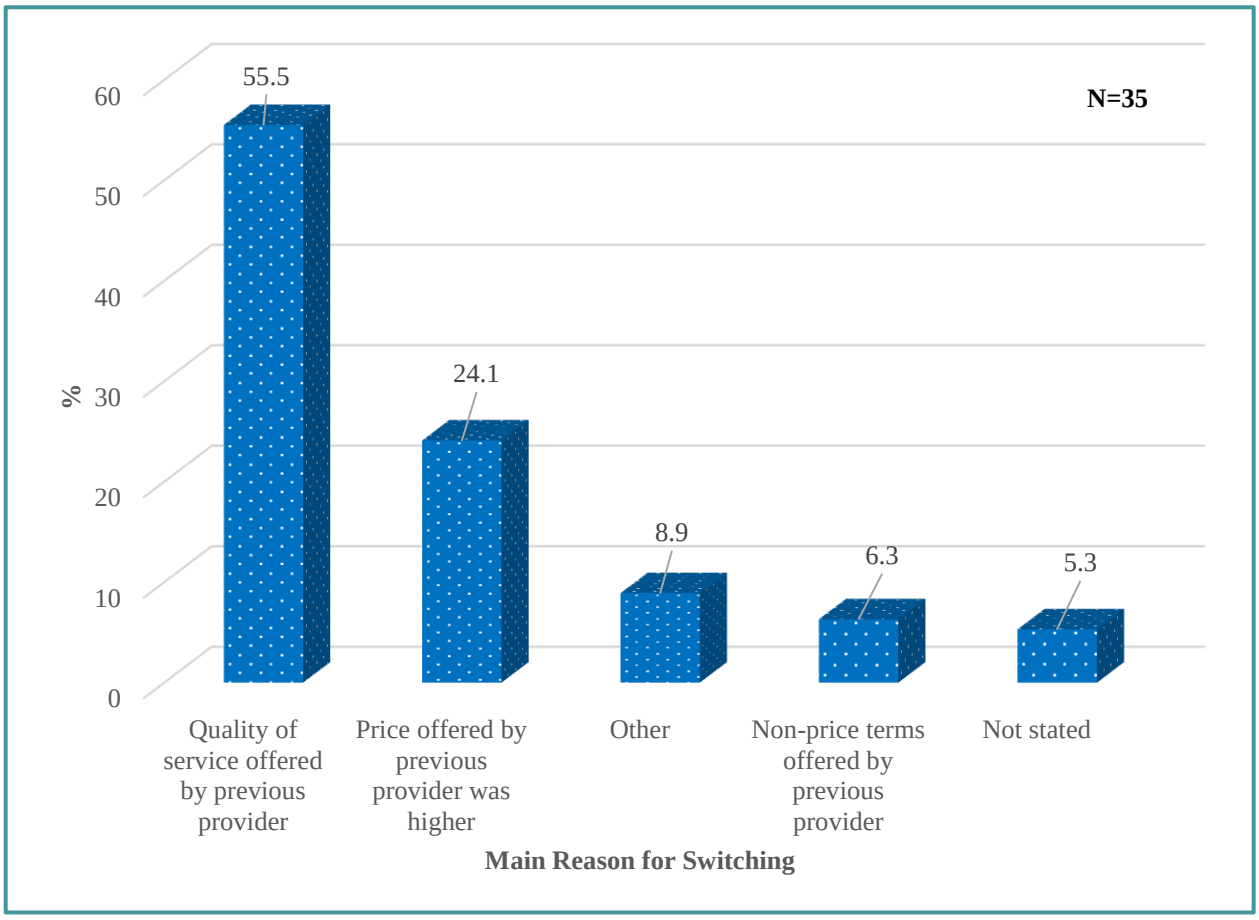


Figure 69. Main reason for switching mobile service providers

Of the 3549 respondents who had switched from their mobile service provider in the preceding two years, 55.5% cited the quality of service offered by the previous provider as the main reason for switching. Just over 24% of respondents indicated that the price offered by the previous provider was higher, and 6.3% cited the non-price terms offered by the previous provider as their main reason for switching.

Respondents who identified other reasons and who did not state a reason accounted for 8.9% and 5.3%, respectively.

[49] N=35 represents respondents who selected "yes", seen in Figure 66.

Figure 70 illustrates the likelihood of respondents switching current mobile service providers in following one to two years.

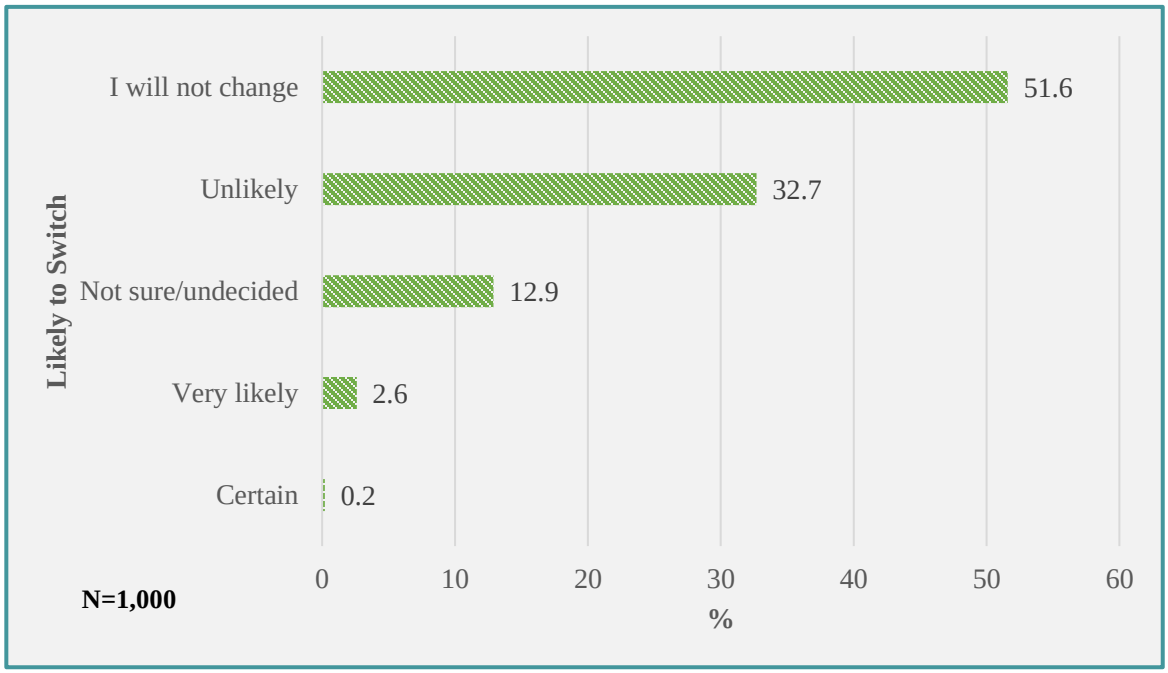


Figure 70. Likelihood of respondents switching from their current mobile service provider within one to two years

Just over half of respondents, 51.6%, indicated that they would not switch; 32.7% said they were unlikely to switch; 12.9% were not sure or undecided; 2.6% stated they were very unlikely to switch; and 0.2% were certain they would switch in the following one to two years.

Figure 71 shows the ranking, in three tiers, of the three most important factors in choosing a mobile service provider.

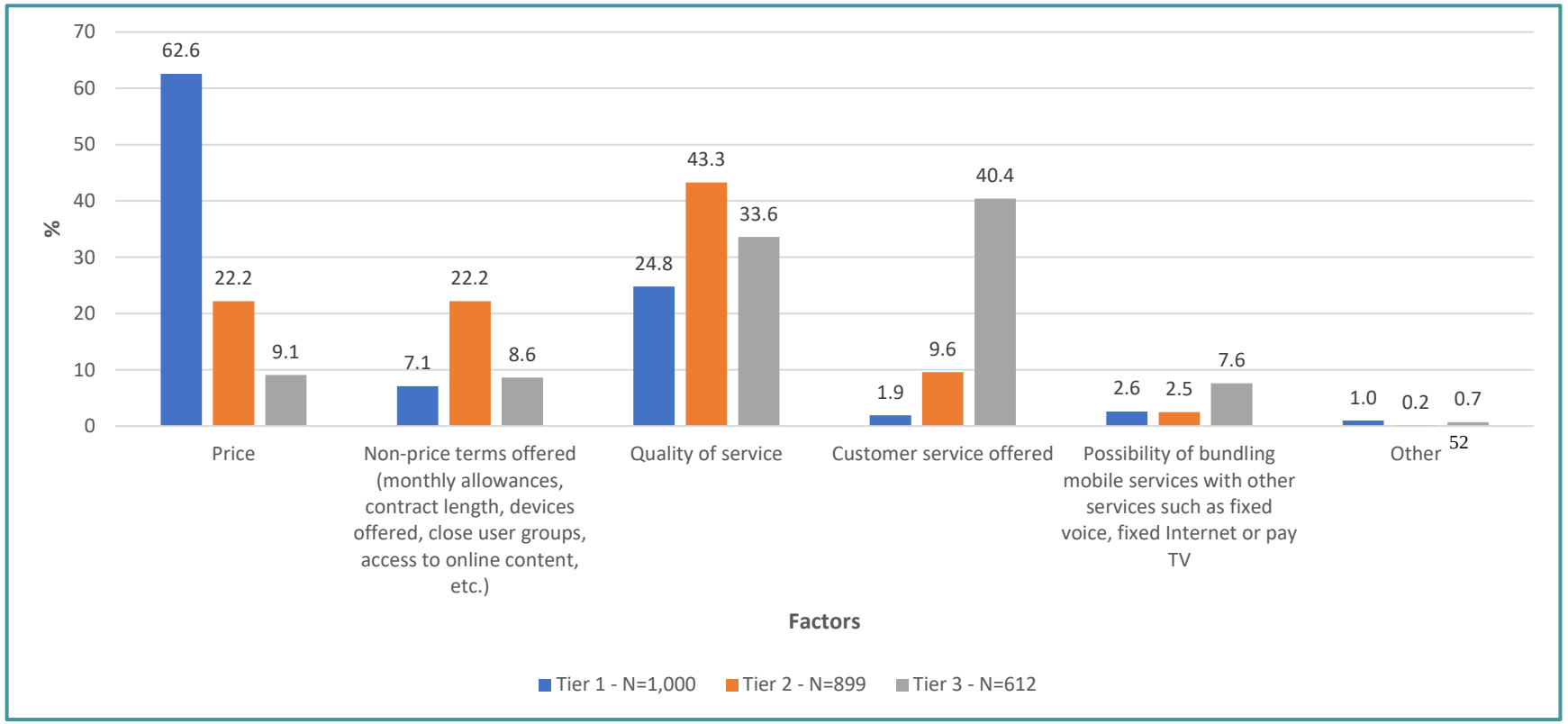


Figure 71. Ranking of three most important factors in choosing a mobile service provider

[50]*Other option responses.*

[50] Seventeen responses were provided in the "Other" category, which included company effectiveness and efficiency, number of subscribers on the provider's network, customer loyalty, the network used by the majority of my contacts, buying local, and the need for multiple SIM cards.

In the first ranked tier, 62.6% of respondents selected price, 24.8% chose quality of service, and 7.1% stated non-price terms offered, as the top three most important factors in choosing a mobile service provider.

In the second ranked tier, 43.3% of respondents cited quality of service, and 22.2% said both price and non-price terms, as the most important factors in choosing a mobile service provider.

With respect to the third ranked tier, customer service offered and quality of service accounted for 40.4% and 33.6%, respectively, and price accounted for 9.1%.

In terms of the second and third ranked factors, not all respondents provided factors for these tiers as requested, resulting in 899 responses in the second tier, and 612 in the third.

Figure 72 depicts the reasons respondents would be unlikely to switch mobile service providers in the following one to two years.

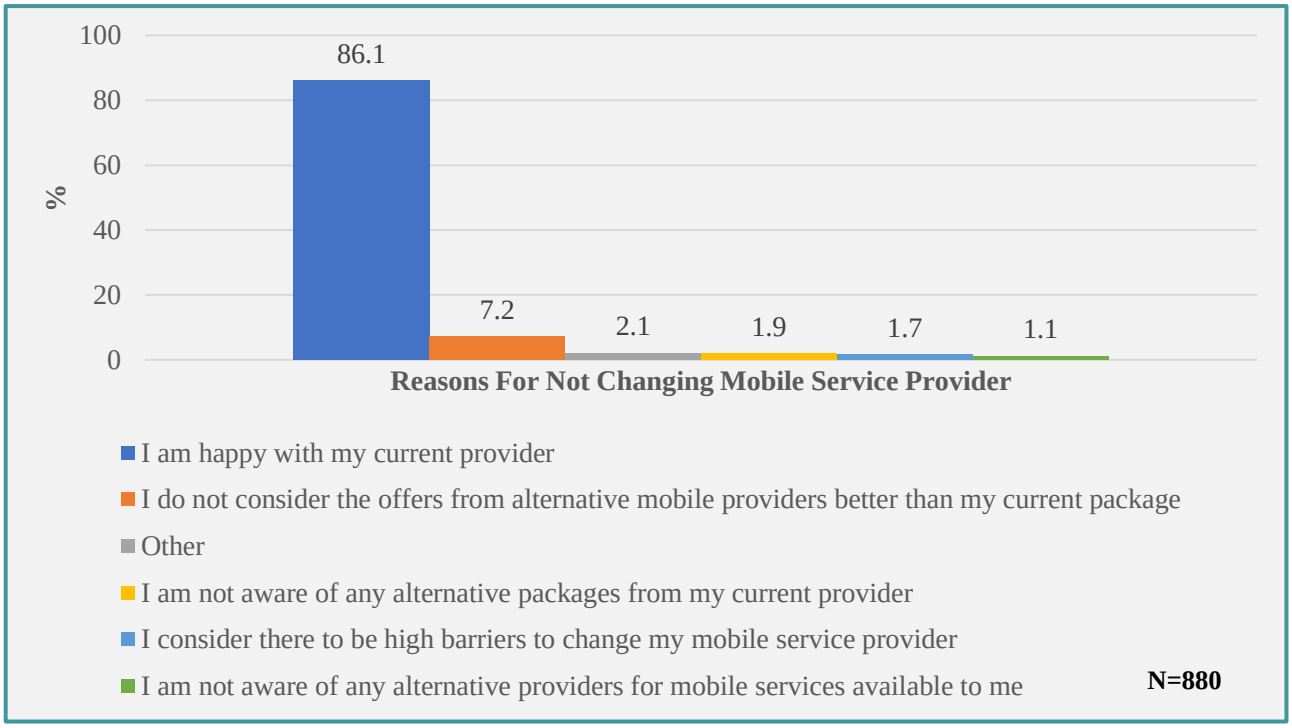


Figure 72. Reasons unlikely to switch mobile service provider in the following one to two years

Of the 880[51] respondents were asked to give reasons why they were unlikely to switch from their mobile service provider in the following next one to two years, just over 86% indicated that they were happy with their current provider.

A total of 7.2% of respondents did not consider the offers from alternative mobile providers better than their current package, while those who were not aware of any alternative packages from their current provider, or who considered there to be high barriers to changing their mobile service provider, accounted for 1.9% and 1.7% of respondents, respectively. A further 2.1% of respondents identified other[52] reasons they were unlikely to switch providers, and approximately 1% were not aware of any alternative providers for mobile services available to them.

[51] N=880 represents respondents who selected "unlikely" or "I will not change", as seen in Figure 70.

[52] Eighteen responses were received in the "Other" category, including already utilising both providers, being able to keep the same number, had a bad experience with previous provider, no difference in providers, and service works well at present.

Figure 73 presents data on which service provider respondents would switch to if their current provider increased the cost of mobile calls.

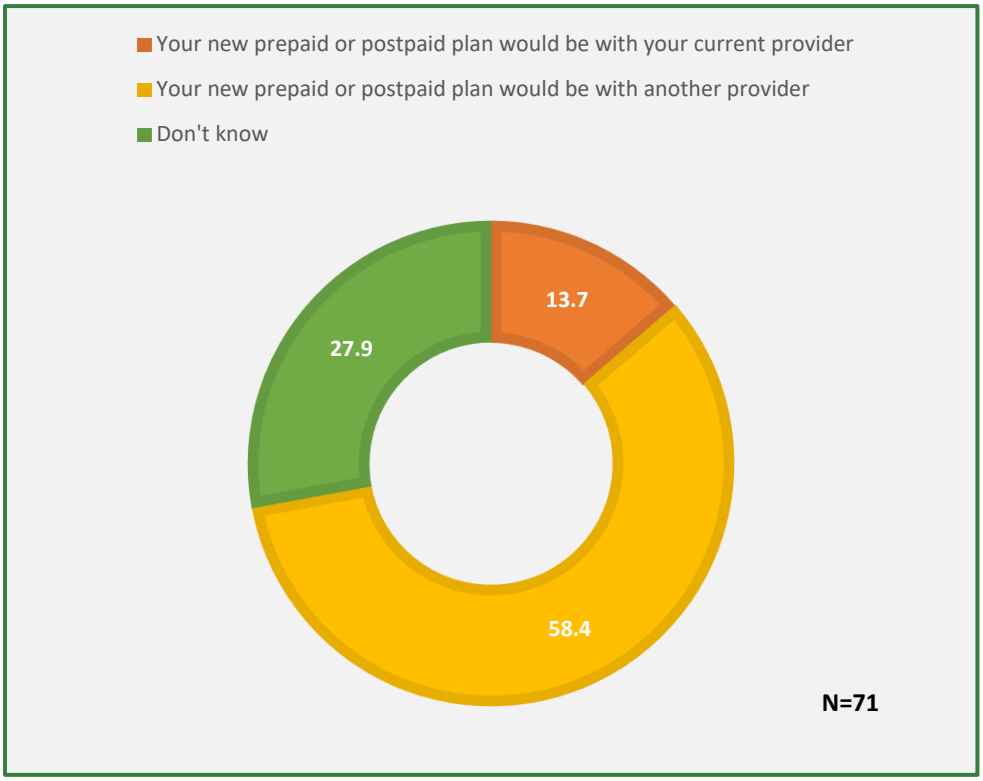


Figure 73. Which service provider respondents would switch to if their current provider increased the cost of mobile calls

Just over 58% of the 71 respondents indicated that their new prepaid or postpaid plan would be with another provider; 13.7% said their new prepaid or postpaid plan would be with their current provider; and 27.9% did not know which provider they would switch to.

Figure 74 illustrates which service provider respondents would switch to if their current provider increased the cost of their mobile data usage.

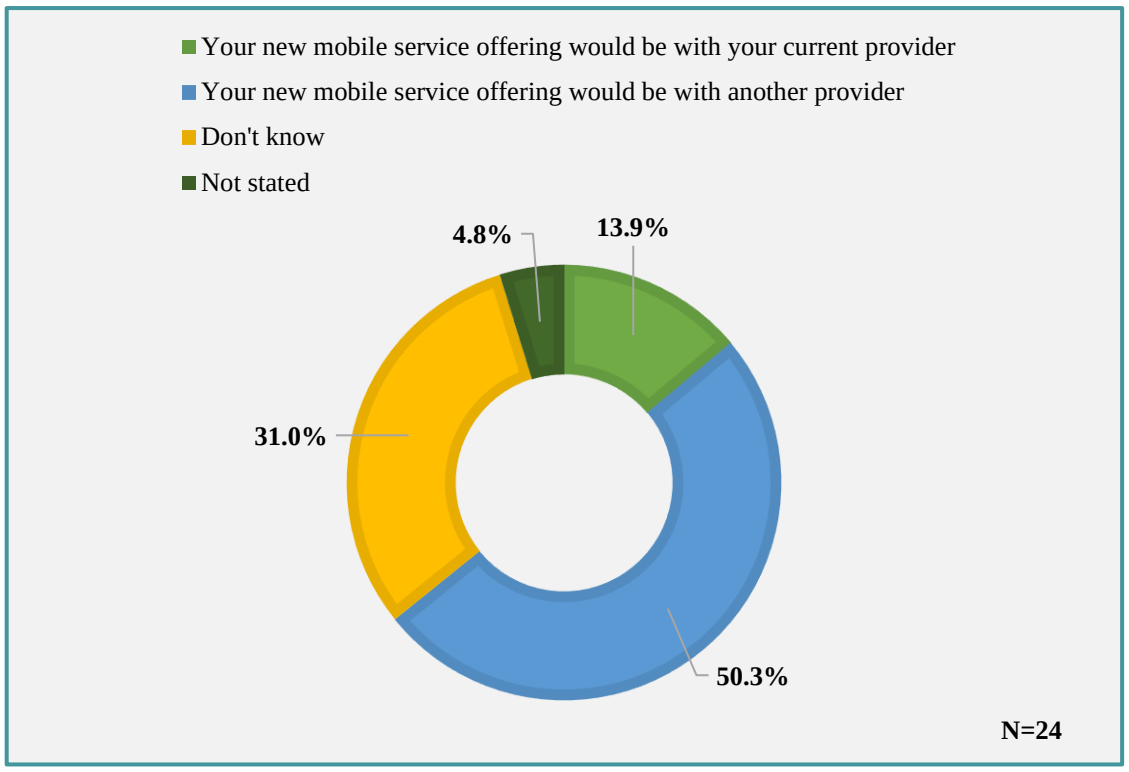


Figure 74. Which service provider respondents would switch to if their provider increased mobile data usage cost

Just over half of respondents, 50.3%, indicated that their new mobile service offering would be with another provider; 13.9% said their new mobile service offering would be with their current provider; 31.0% stated they did not know which provider they would switch to; and 4.8% did not say.

Figure 75 shows which service provider respondents would switch to if their current provider increased the cost of their mobile plan or package.

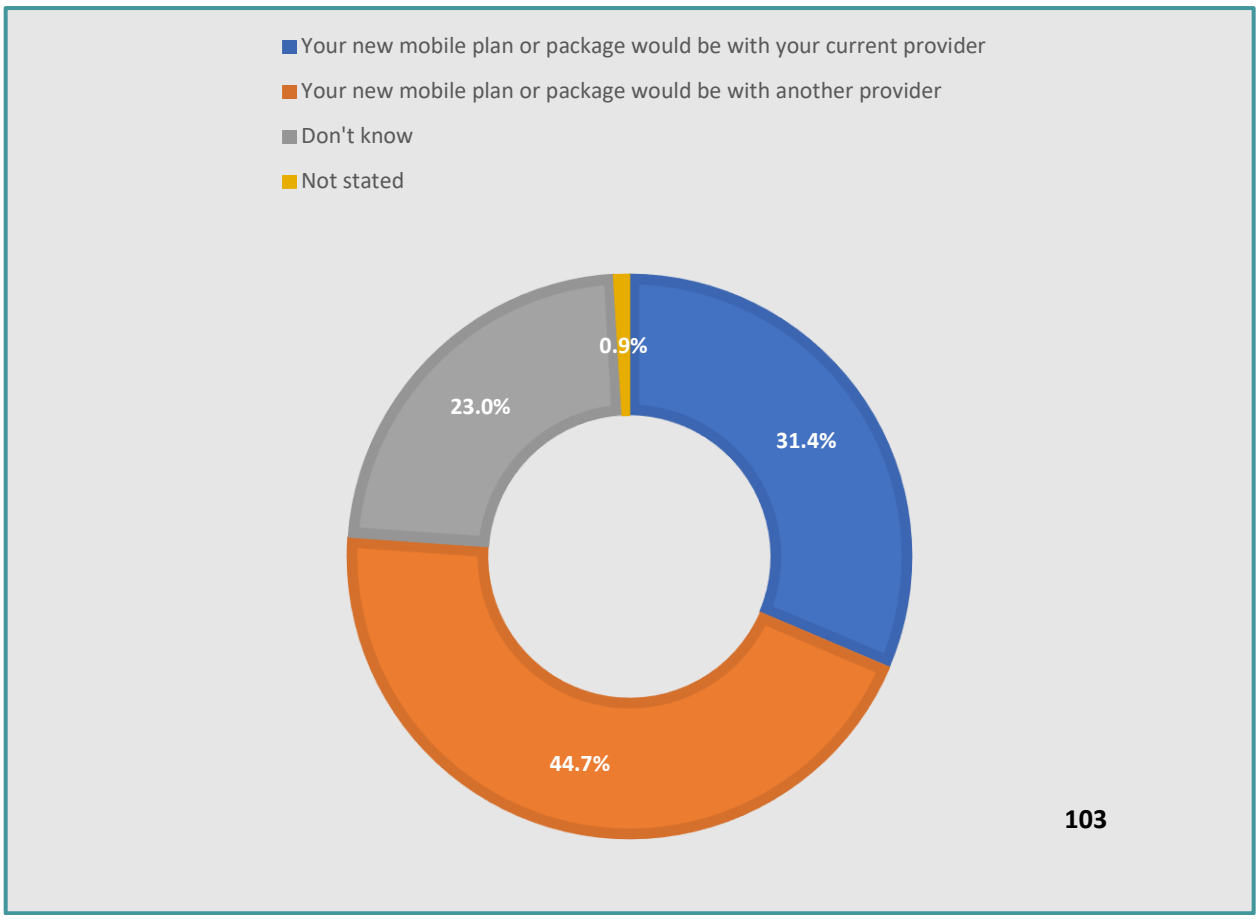


Figure 75. Which service provider respondents would switch to if their provider increased the cost of their mobile plan or package

Of the respondents who answered questions about their switching choice if their service provider increased the cost of their mobile plan/package, 44.7% indicated that they would select another provider; 31.4% said their new plan would be with their current provider; 23.0% did not know which provider they would switch to; and 0.9% chose not to say.

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