

POSTAL AND TELECOMMUNICATIONS REGULATORY AUTHORITY OF ZIMBABWE (POTRAZ)



ANNUAL POSTAL AND TELECOMMUNICATIONS SECTOR PERFORMANCE REPORT

2019

Disclaimer:

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1. EXECUTIVE SUMMARY

This report presents annual information on the performance of the markets within the postal and telecommunications sector during the period January to December 2019, covering data on subscriptions, usage traffic, infrastructure deployment, revenues, investment and employment in the postal and telecommunication sector. The data collected is also used by the Authority to monitor and inform policy decisions aimed at facilitate orderly growth of these sectors. The major highlights of the postal and telecommunications sector in 2019 were as follows:

- **Marginal growth in mobile and internet subscriptions and a decline in fixed subscriptions**

The total number of active mobile subscriptions grew by 2.2% to reach 13,195,902 up from 12,908,992 recorded in 2018. The total number of active internet subscriptions also increased by 1.3% to reach 8,836,299 from 8,723,242 subscriptions recorded in 2018. The total number of active fixed telephone lines declined by 1.1% to record 265,734 from 268,849 recorded in 2018. As a result, the fixed teledensity declined from 1.9% recorded in 2018 to reach 1.8% in 2019 as shown below:

- **Growth in national voice traffic vis-à-vis decline in international voice traffic**

Total voice traffic increased by 15.2% to record 6.15 billion minutes from 5.34 billion minutes recorded in 2018. The growth in voice traffic in 2018 is attributable to the growth in mobile on-net traffic because of promotions offering bonus minutes for calls within the same network. However international incoming traffic declined by 4.4% to record 170.7 million from 178.4 million minutes recorded in 2018. International outgoing traffic also declined by 34.3% to record 62.4 million minutes from 95.1 million minutes recorded in 2018.

- **Growth in internet and data usage**

Internet and data usage has been consistently growing as consumer preferences change and services become more data-centric. Mobile internet and data usage grew by 31% to record 35,733 Terabytes in 2019 from 27,278 Terabytes recorded in 2018. However, the annual growth rate for mobile internet recorded a significantly decline from a growth rate of 77.6%

recorded in 2018. Used incoming international bandwidth capacity by Access Internet Access Providers also increased by 38.1% to record 116,927Mbps from 84,683Mbps recorded in 2018.

- **Decline in postal and courier volumes**

Total postal and courier volumes declined by 32% to record 5.3 billion items in 2019 from 7.8billion items recorded in 2018. Postal and courier volumes have been consistently declining over the past five years. The decline in postal and courier volumes, in particular domestic, is attributable to e-substitution.

- **Growth in sector revenues vis-à-vis rising operating costs**

The year 2019 was characterised by a trend of growing revenues and rising operating costs due to the inflationary environment. The quarter-on-quarter growth in revenues averaged 87.2% whereas the quarter-on-quarter growth in operating costs averaged 90.6%. Annual sector revenue for 2019 was ZW\$ 4.5 billion; 2018 sector revenue was US1.6 billion. Operating costs for the sector in 2019 amounted to ZW\$3.3 billion; total operating costs in 2018 were US974.4 million.

- **Market structures remain relatively unchanged**

Market structures remained relatively unchanged across postal and telecommunications markets in 2019; save for the delicensing of 1 Internet Access Provider, Aquiva. The list of the licensed operators in the various markets as at 31 December 2019 is provided in the following table:

Market	Service Description	Licensed Operators
Fixed Telephone Service	Fixed Voice and Fixed Internet Services	1. TelOne
Mobile Cellular Services	Mobile Voice and Internet Services	1. Econet
		2. NetOne
		3. Telecel
Internet Access Providers (Class A)	Data and Internet Services	1. Africom
		2. TelOne
		3. Dandemutande
		4. Liquid

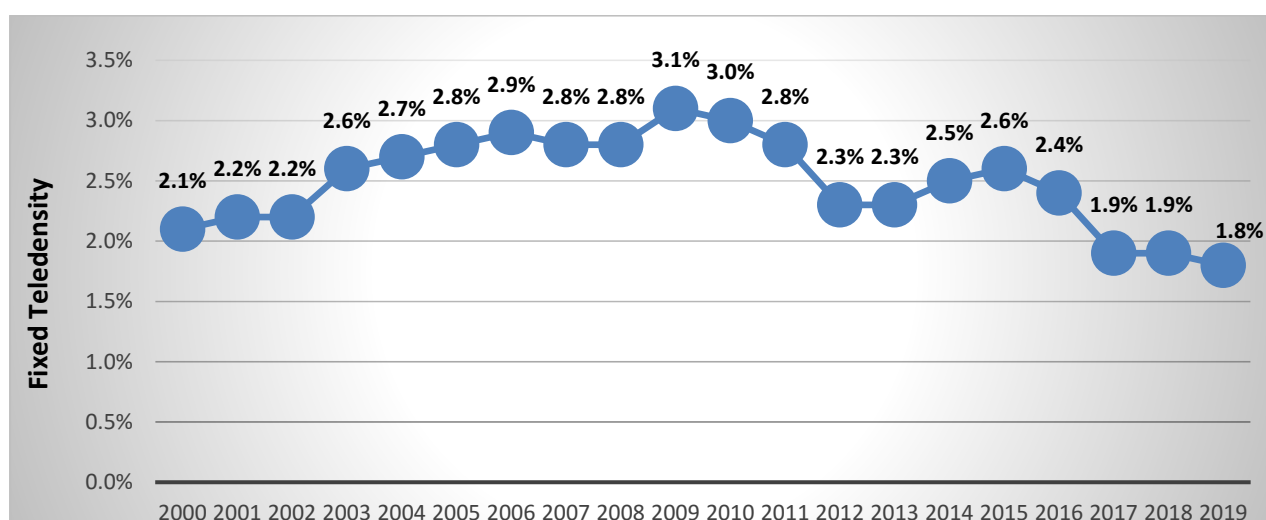
		5. Pegasus
		6. Powertel
		7. Telecontract
		8. Transmedia
Internet Access Provider (Class B)	Data and Internet Services	1. CommIT
		2. NetOne
Postal Services	Postal Services	1. ZIMPOST
Courier Services	Domestic and International Courier Services	1. DHL
		2. FEDEX
		3. Courier Connect
		4. Unifreight/Swift
		5. Innscor Transport Company t/a Overnight express
		6. United Parcel Services
		7. Skynet

2. SUBSCRIPTIONS & PENETRATION RATES

2.1 FIXED

The total number of active fixed telephone lines declined by 1.1% to record 265,734 as at 31 December 2019 from 268,849 recorded as at 31 December 2018. Using a population of 14,572,011 for 2019, as per ZIMSTAT gives a fixed teledensity of 1.8% for 2019 down 1.9% recorded in 2018 as shown below:

Figure 1: Fixed Teledensity



The fixed telephone continues to experience competition from mobile telephony and VoIP hence, the gradual decline in subscriptions over the years, especially at household level.

3.2 MOBILE

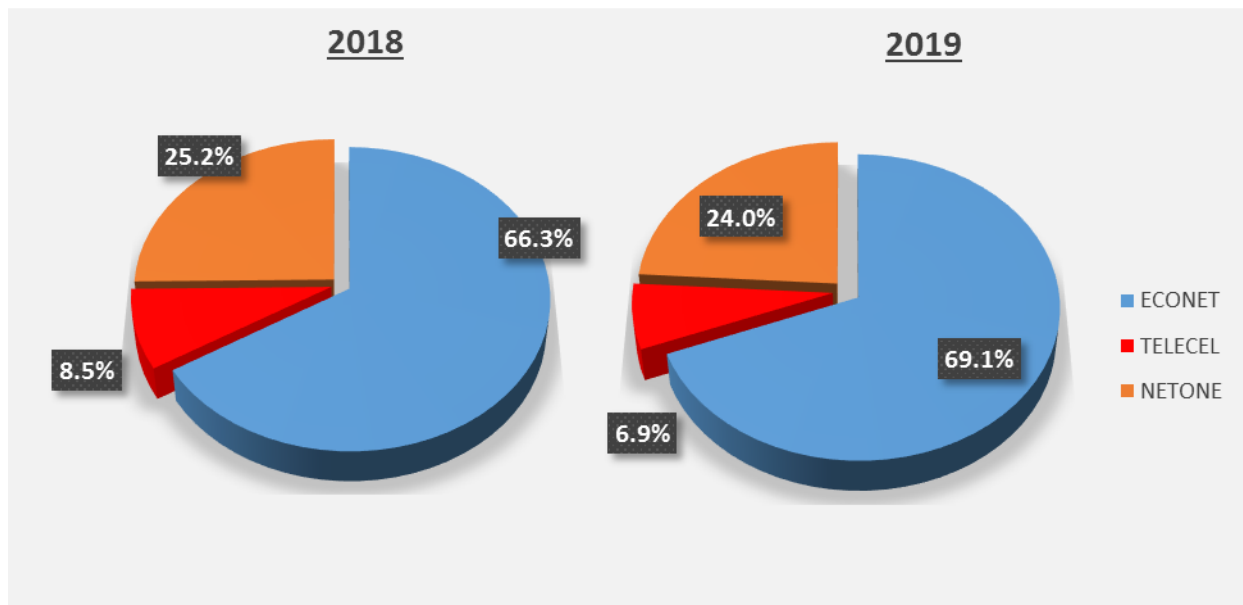
The total number of active mobile subscriptions grew marginally by 2.2% to reach 13,195,902 in 2019 from 12,908,992 recorded in 2018. Econet recorded growth in subscriptions whereas NetOne and Telecel recorded a decline in subscriptions as shown in the following:

Table 1: Active Mobile Subscriptions per Operator

	Active Subscriptions 2018	Active Subscriptions 2019	% Change
Econet	8,552,289	9,117,826	6.6%
Telecel	1,100,111	910,677	-17.2%
NetOne	3,256,592	3,167,399	-2.7%
Total	12,908,992	13,195,902	2.2%

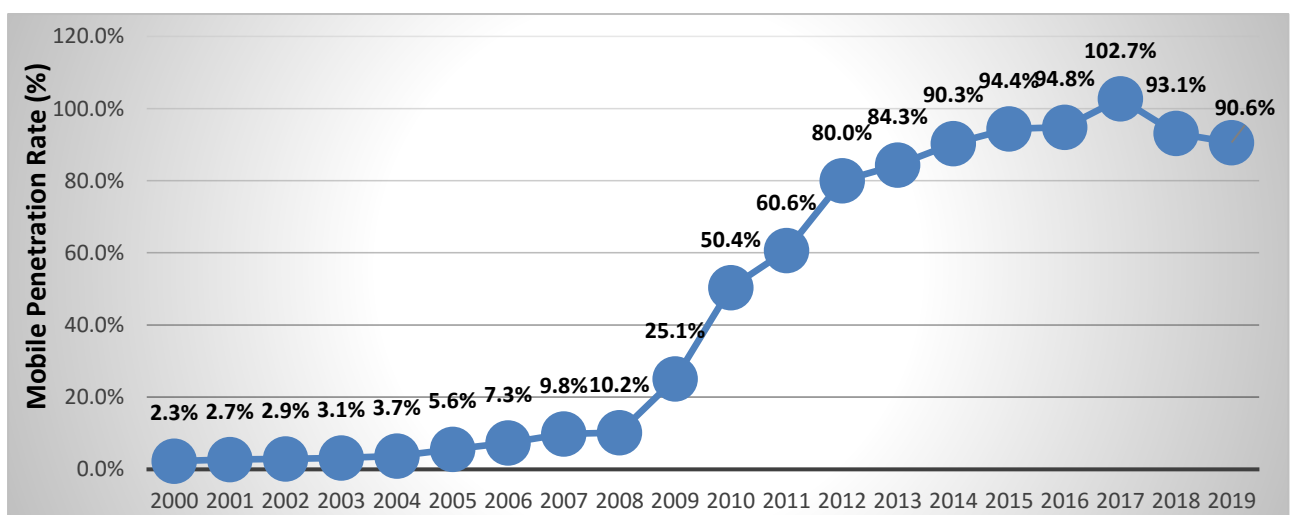
Econet's market share grew in line with the growth in their subscriber base, whereas Telecel and NetOne's market shares decline as shown below:

Figure 2: Market Share of Mobile Subscriptions



Recalculating the mobile penetration rate using a population of 14,572,011 for 2019, as per ZIMSTAT gives a mobile penetration rate of 90.6% down from 93.1% recorded in 2018 as shown below:

Figure 3: Mobile penetration rate



This implies that active mobile subscriptions grew by a lower margin than the population growth rate.

3.3 INTERNET

The total number of active internet subscriptions also increased by 1.3% to reach 8,836,299 from 8,723,242 subscriptions recorded in 2018. The annual growth of internet subscriptions per category is shown in the following table:

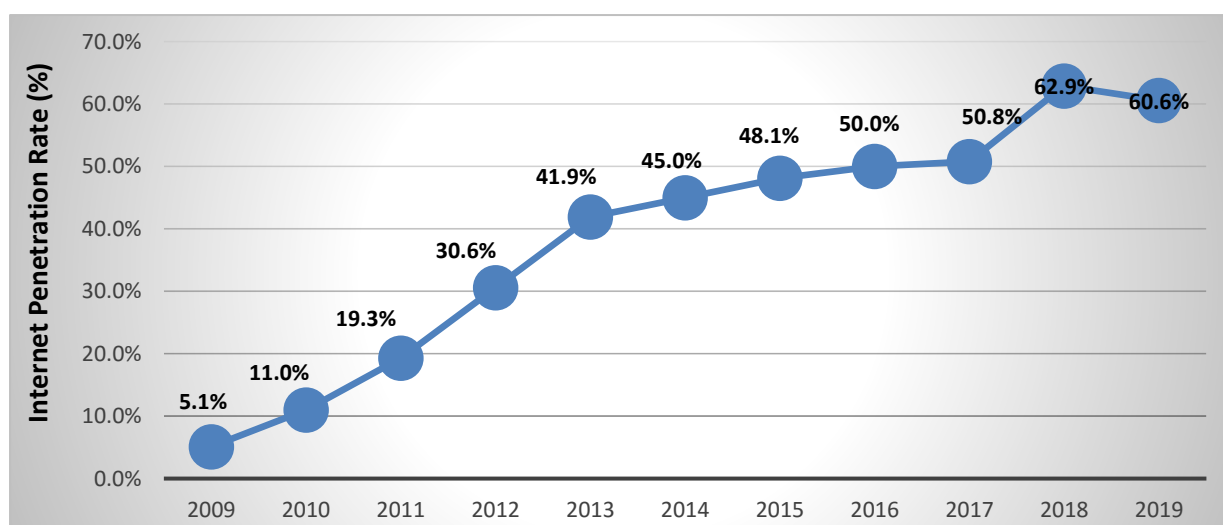
Table 2: Active Internet Subscriptions

Technology	2018	2019	Variance
Mobile Internet (3G, LTE...)	8,550,186	8,659,875	1.3%
Leased Lines	2,026	2,123	4.8%
ADSL	95,761	106,036	10.7%
WiMAX	3,414	2,156	-36.8%
CDMA	28,489	22,834	-19.8%
VSAT	3,989	3,395	-14.9%
Active Fibre links	39,377	39,880	1.3%
TOTAL	8,723,242	8,836,299	1.3%

Source: POTRAZ, Operator Returns

VSAT, WiMAX and CDMA subscriptions have been showing a declining trend over the years as subscribers migrate to other technologies such as Fibre and ADSL. Recalculating the mobile penetration rate using a population of 14,572,011 for 2019, as per ZIMSTAT gives an internet penetration rate of 60.6% down from 62.9% recorded in 2018 as shown below:

Figure 4: Internet penetration rate

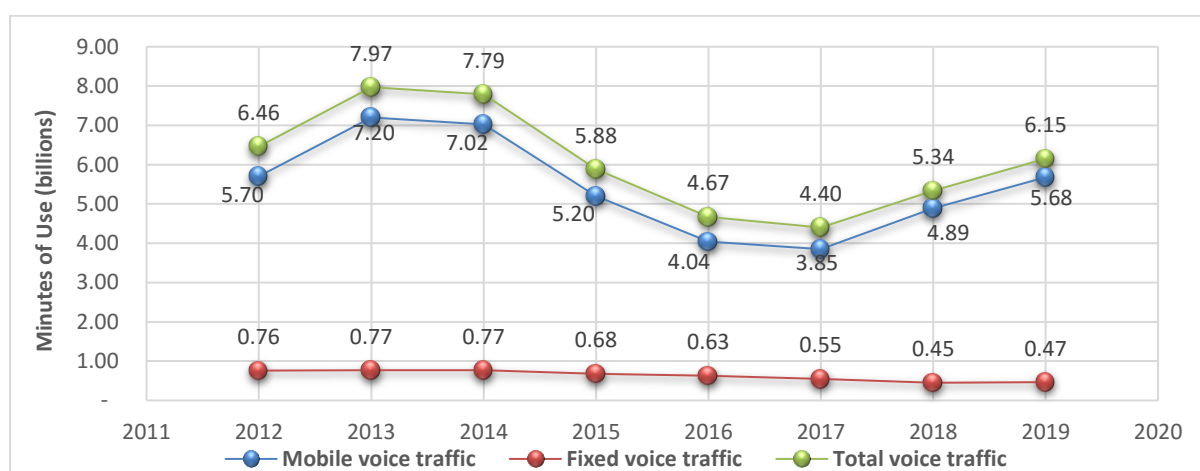


3. TRAFFIC AND USAGE PATTERNS

3.1 VOICE TRAFFIC

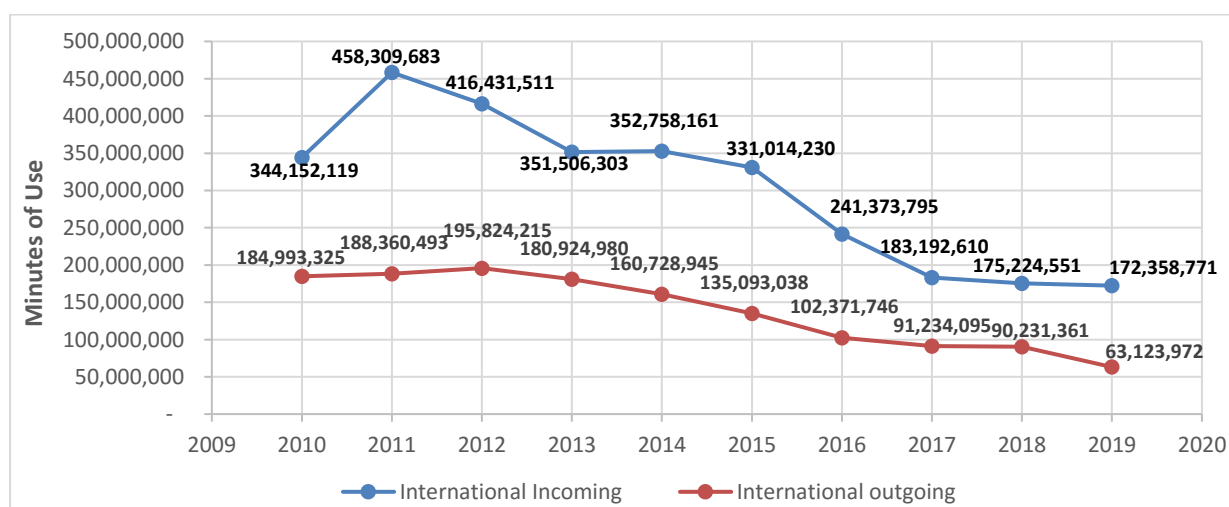
Mobile and fixed voice traffic recorded growth for a consecutive year; total voice traffic increased by 15.2% to record 6.15 billion minutes from 5.34 billion minutes recorded in 2018. The growth in voice traffic in 2018 is attributable to the growth in mobile on-net traffic because of promotions offering bonus minutes for calls within the same network. Both the fixed and mobile network recorded growth in voice traffic as shown below:

Figure 5: Mobile Voice Traffic



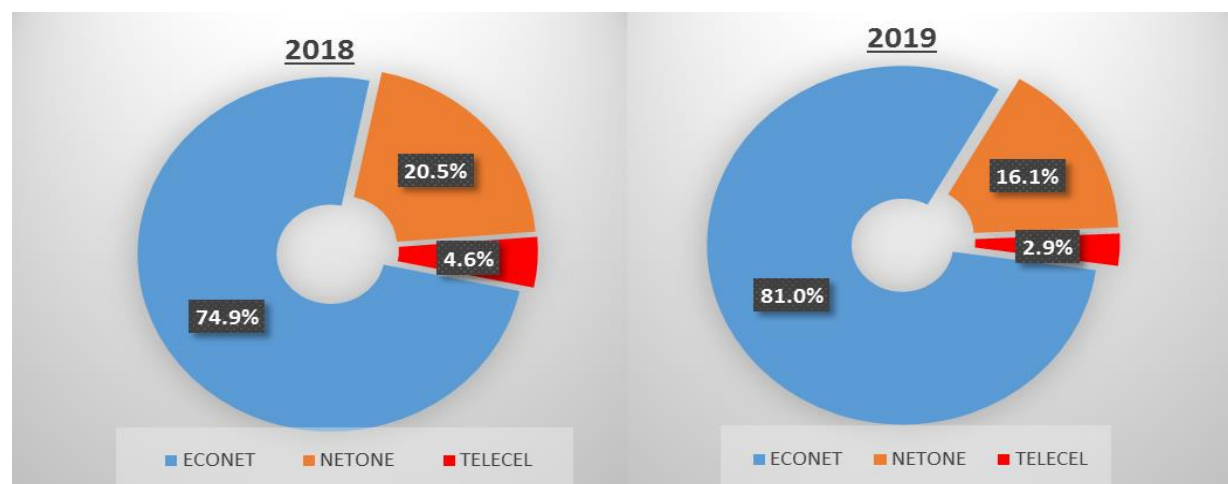
Despite the growth in on-net traffic, other traffic categories have been declining, international voice traffic in particular. International incoming traffic declined by 4.4% to record 170.7 million from 178.4 million minutes recorded in 2018. International outgoing traffic also declined by 34.3% to record 62.4 million minutes from 95.1 million minutes recorded in 2018.

Figure 6: International traffic



The declining trends in international traffic are largely attributable to the substitution effect of alternative calling procedure presented mainly by Over-The-Top services (OTTs) amidst of the low disposable income. A comparison of the market share of annual voice traffic in is shown in Figure 7 below:

Figure 7: Mobile Voice Traffic Market Share

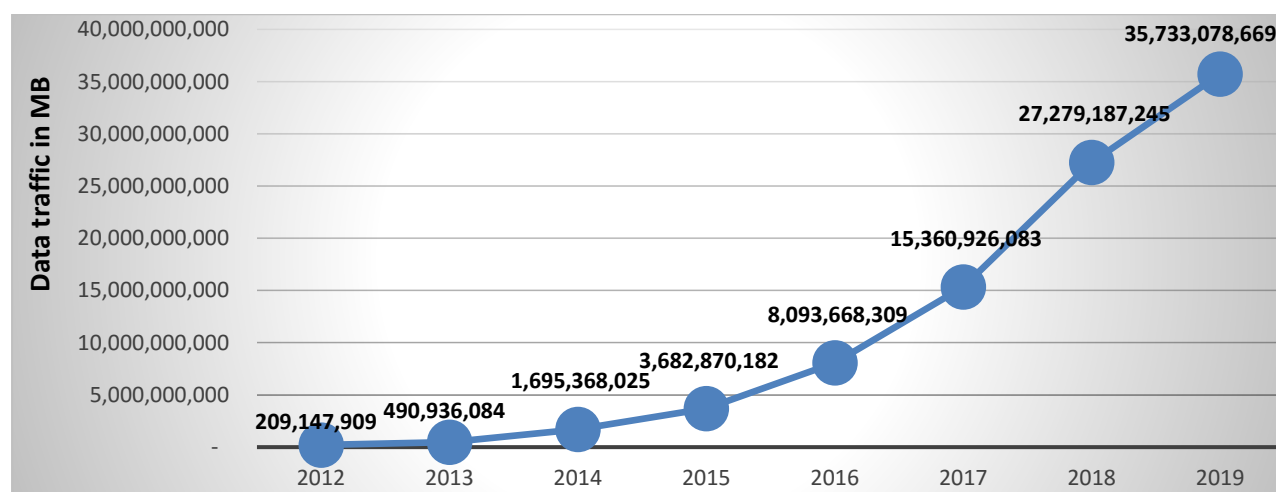


As shown above, Econet's market share grew, whereas Telecel and NetOne's market share declined. Econet's dominance in the voice service market increased considerably in 2019.

3.2 INTERNET & DATA TRAFFIC

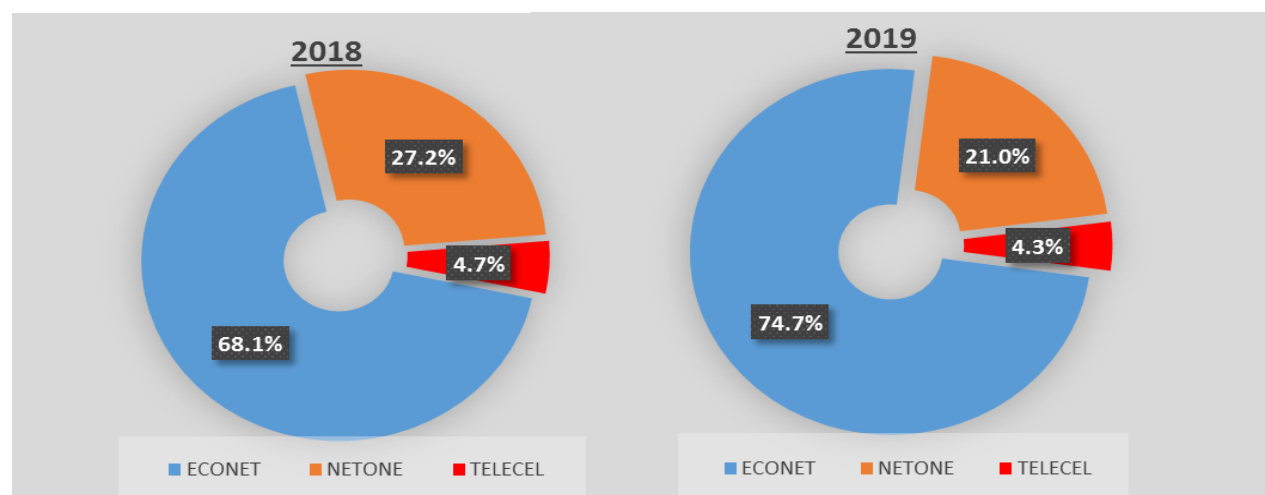
Mobile internet and data usage grew by 31% to record 35,733 Terabytes in 2019 from 27,278 Terabytes recorded in 2018. The annual growth in mobile internet and data usage from 2012 to 2019 is shown below:

Figure 8: Growth in mobile internet & data usage



Demand for internet services has been consistently growing, however, the annual growth rate for mobile internet declined significantly from a growth rate of 77.6% recorded in 2018 to 31% in 2019. Based on the mobile data usage per mobile operator, the market share of mobile data usage over the course of the year was as follows:

Figure 9: Market Share of Internet & data traffic



As shown above, Econet's market grew by 6.6%, whereas Telecel and NetOne's market share declined by 0.4% and 6.2% respectively. All the mobile operators experienced fluctuations in market share of internet and data. Used incoming international bandwidth capacity by Access Internet Access Providers also increased by 38.1% to record 116,927Mbps from 84,683Mbps recorded in 2018; down from a growth rate of 77.2% recorded in 2018.

3.3 POSTAL & COURIER VOLUMES

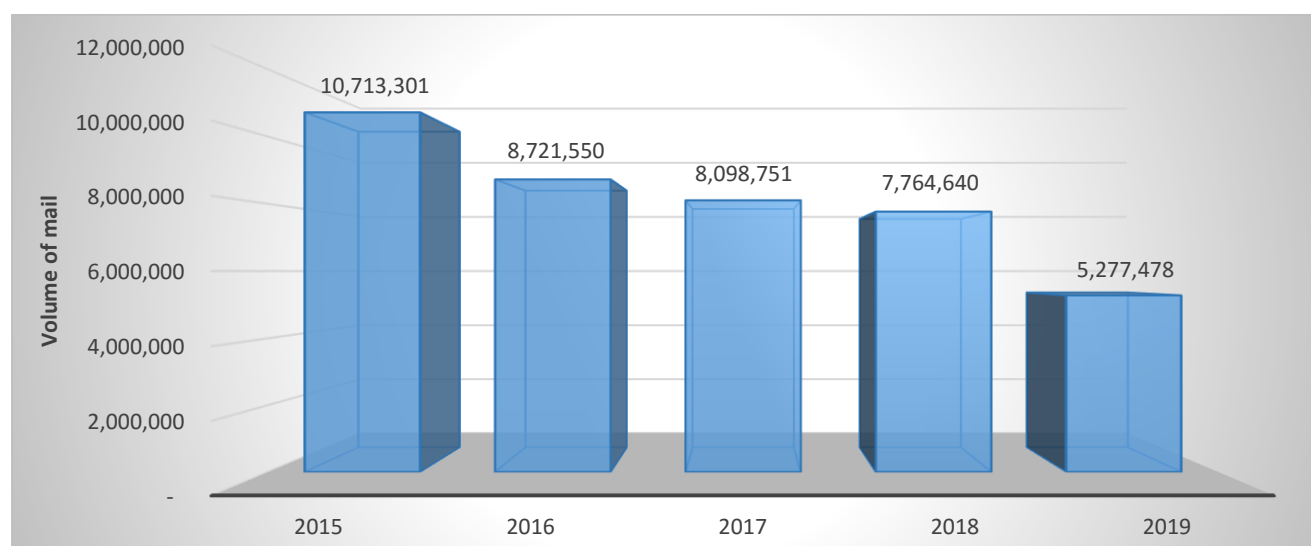
Total postal and courier volumes declined by 32% to record 5,277,478 units from 7,764,640 units recorded in 2018. The annual growth per postal and courier category is shown in Table 3 below:

Table 3: Postal & Courier Volumes

	2018	2019	% Growth
Domestic postal	5,451,285	3,212,620	-41.1%
domestic courier	538,939	716,456	32.9%
International incoming postal & courier	1,389,082	1,168,061	-15.9%
International outgoing postal & courier	385,334	180,341	-53.2%
Total postal & courier	7,764,640	5,277,478	-32.0%

Postal and courier volumes have been gradually declining over the years as shown in Figure 10 below:

Figure 10: Postal & Courier Volumes



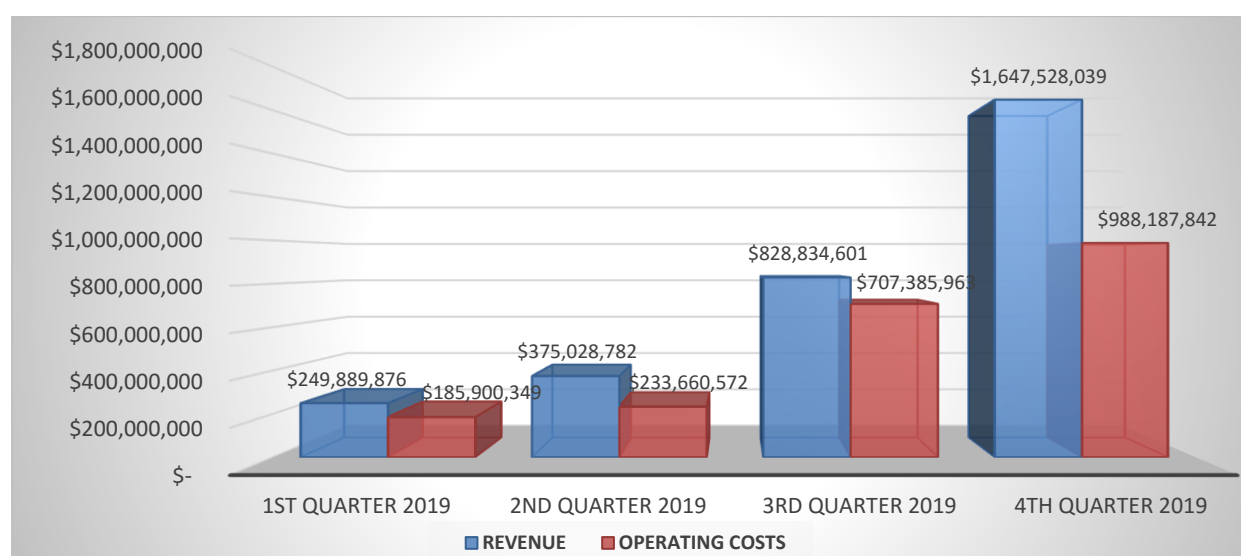
The gradual decline in postal and courier traffic is attributable to e-substitution as technology provides alternative channels for the transmission of information.

4. REVENUES & INVESTMENT

4.1 MOBILE

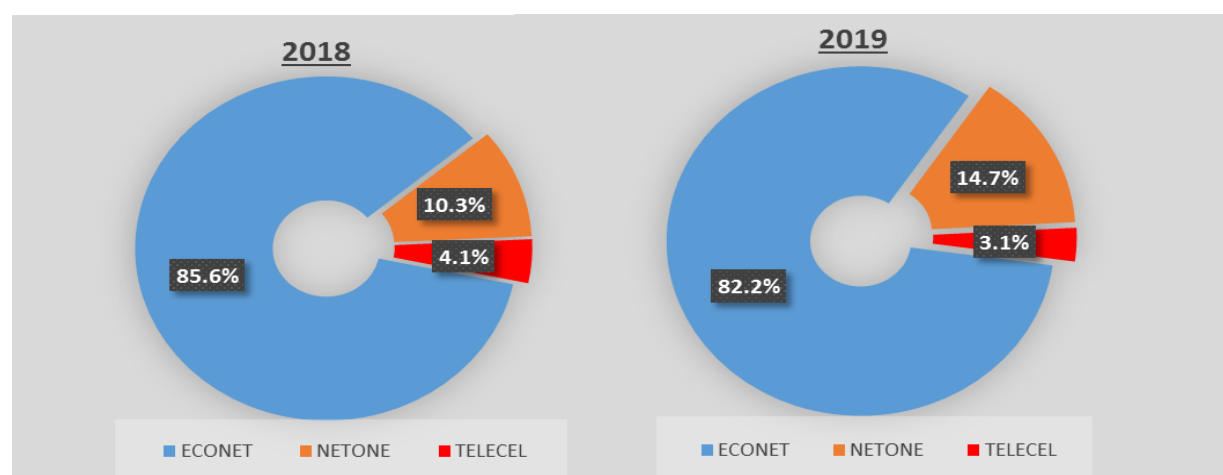
A trend of growing revenues vis-à-vis rising operating costs was observed over the course of the year, as shown below:

Figure 11: Mobile Network Revenues & Costs



Total mobile network revenue for 2019 was ZW\$3,101,281,298 compared to US\$1,155,754,561 recorded in 2018. Operating costs for the sector in 2019 amounted to ZW\$2,115,134,726 compared to US\$660,599,344 recorded in 2018. Total investment 2019 ZW\$70,174,478 in 2019 from US\$59,538,288 recorded in 2018. Figure 12 below shows an annual comparison of the mobile revenues market share.

Figure 12: Market share of mobile revenues

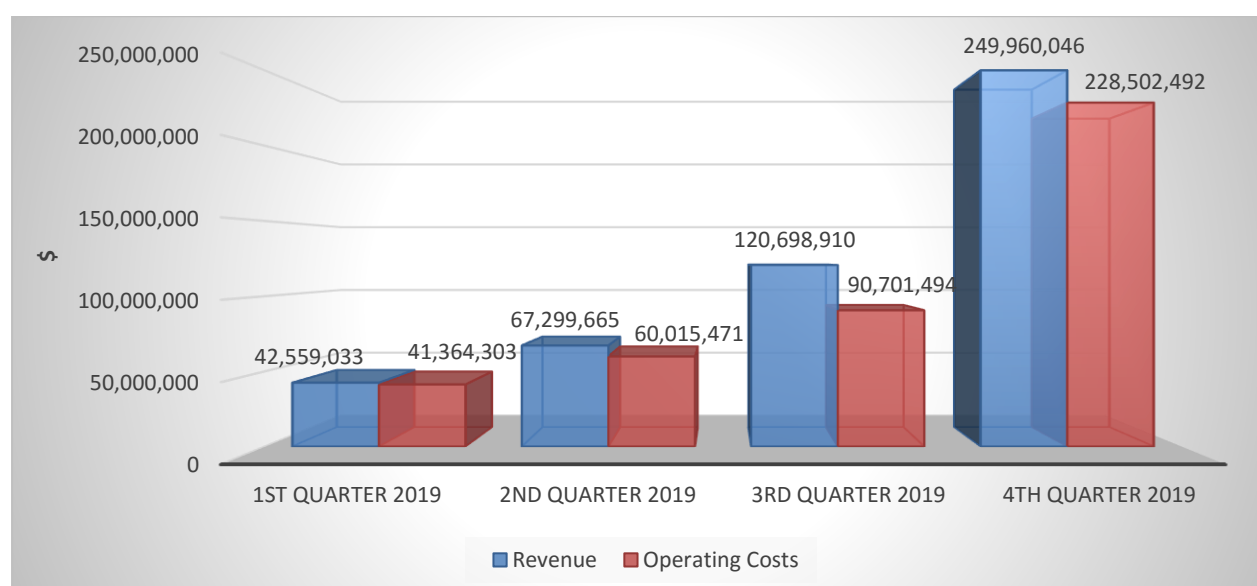


As shown above, Econet and Telecel lost revenue market share by 3.4% and 1% respectively whereas NetOne gained market share by 4.4%.

4.2 FIXED TELEPHONY REVENUES & INVESTMENT

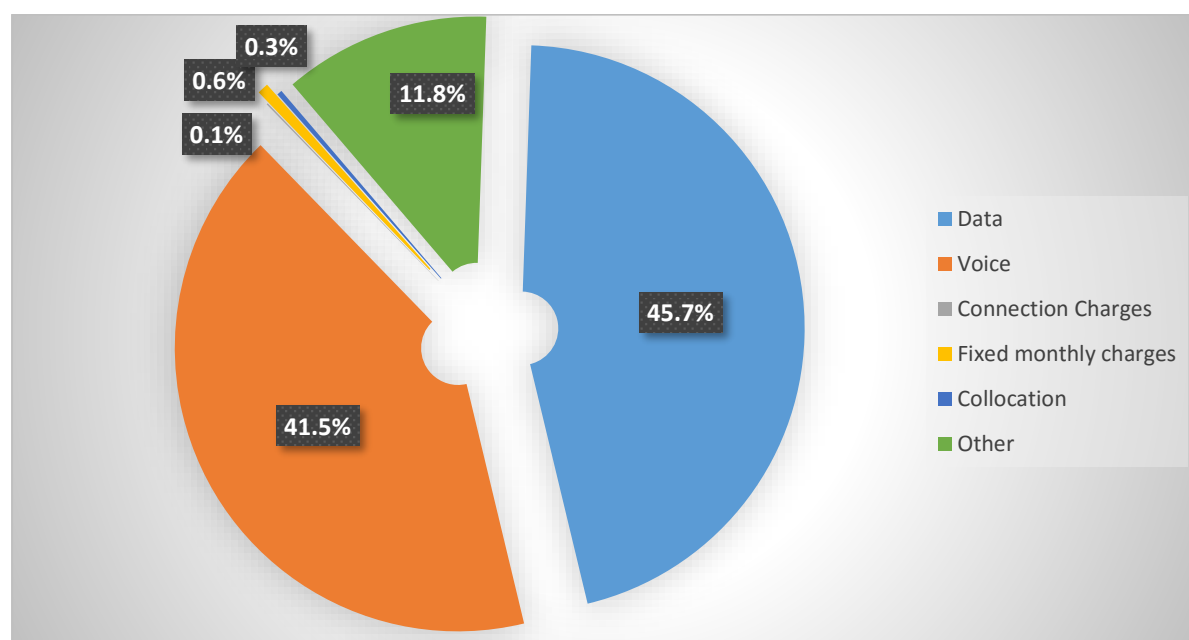
A trend of growing revenues vis-à-vis growing operating costs was also experienced by the fixed telephone network as shown below:

Figure 13: Fixed Telephone Revenues & Operating Costs



Total fixed network revenue for 2019 was ZW\$480,517,654 compared to US\$135,422,088 recorded in 2018 whilst operating costs for the sector in 2019 amounted to ZW\$420,583,760 compared to US\$144,685,861 recorded in 2018. The revenue contribution per service is shown in Figure 14 below:

Figure 14: Contribution to revenue by service

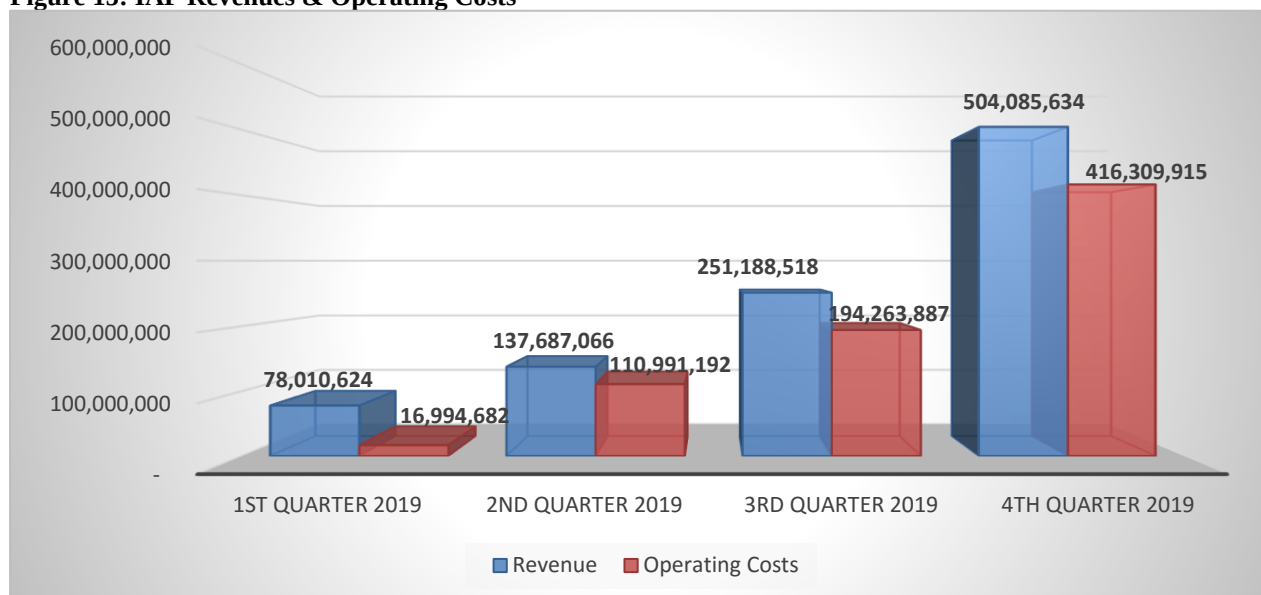


Revenue from data and internet exceeded revenue from voice as shown above. This phenomenon is consistent with the growth of data usage as services become more data centric. Total investment by the fixed network in 2019 was ZW\$42,097,844 from US\$22,412,620 recorded in 2019. The investment was mainly in national transmission.

4.3 IAP REVENUES & INVESTMENT

Revenue by Internet Access Providers totalled ZW\$970,971,842 in 2019 as compared to US\$273.1 million recorded in 2018. A trend of growing IAP revenues vis-à-vis rising operating costs was observed over the course of the year as shown below:

Figure 15: IAP Revenues & Operating Costs



Operating costs totalled ZW\$738,559,676 as compared to US\$135,082,190 recorded in 2018. On the other hand, capital expenditure by Internet Access Providers was ZW\$68,055,177 from US\$77,558,015 recorded in 2018. The capital expenditure was mainly on the national fibre backbone. An annual comparison of the IAP revenue market share is shown in the following table:

Table 4: IAP Revenues Market Share

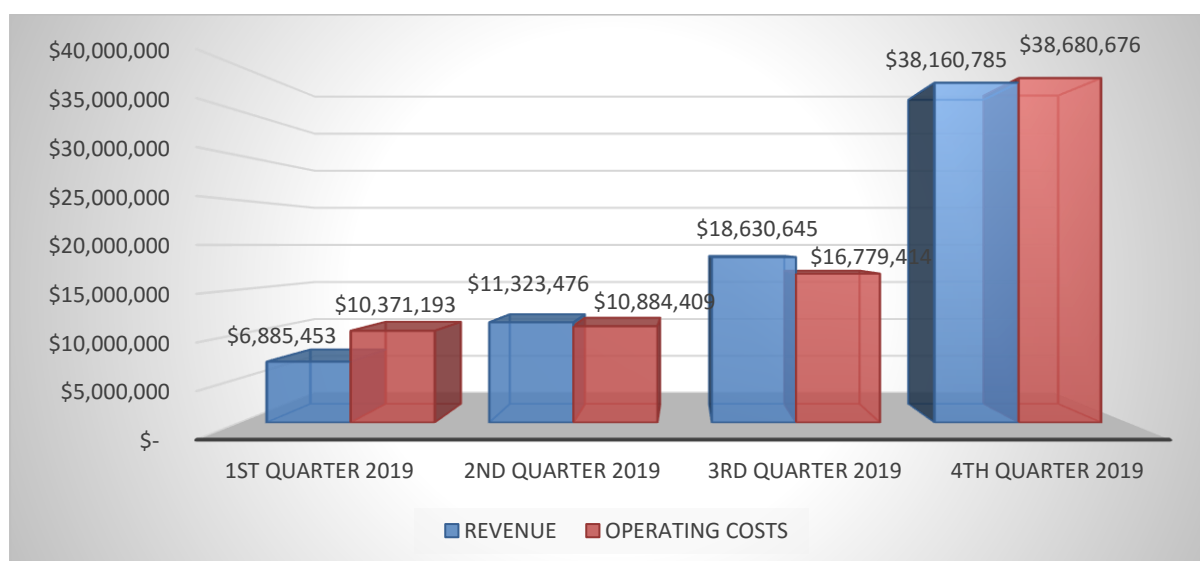
	Market Share of IAP Revenues 2018	Market Share of IAP Revenues 2019	Variance
Liquid	56.1%	60.4%	4.3%
TelOne	26.2%	22.7%	-3.5%
Powertel	9.6%	8.1%	-1.5%
Dandemutande	4.4%	6.2%	1.8%
Africom	2.4%	1.9%	-0.5%
Telecontract	1.1%	0.9%	-0.2%
Aquiva	0.2%	-	-
Total	100%	100%	100%

As shown above, Liquid and Dandemutande gained market share whilst the rest of the IAPs recorded a decline.

4.4 POSTAL & COURIER REVENUES, INVESTMENT & COST

Postal and courier operators generated a total of ZW\$76,715,692 in 2019; 2018 revenue totalled US\$35,274,733. Operating costs totalled ZW\$75,000,359 in 2019 from US\$38,866,918 recorded in 2018. As with other subsectors, the postal and courier operators have not been spared by inflationary pressures characterised by rising operating costs as shown below:

Figure 16: Postal & Courier Revenues & Costs



On the other hand, Capital expenditure by postal and courier operators was ZW\$3,483,311 in 2019. The capital expenditure was mainly in motor vehicles as well as hardware and software.

5. MOBILE MONEY

5.1 SUBSCRIPTIONS

The total number of active mobile money subscriptions was 7,334,639 as at 31 December 2019. This represents a 15.5% growth from 6,352,552 recorded in 2018. The growth in active mobile money subscriptions per operator is shown in the following table:

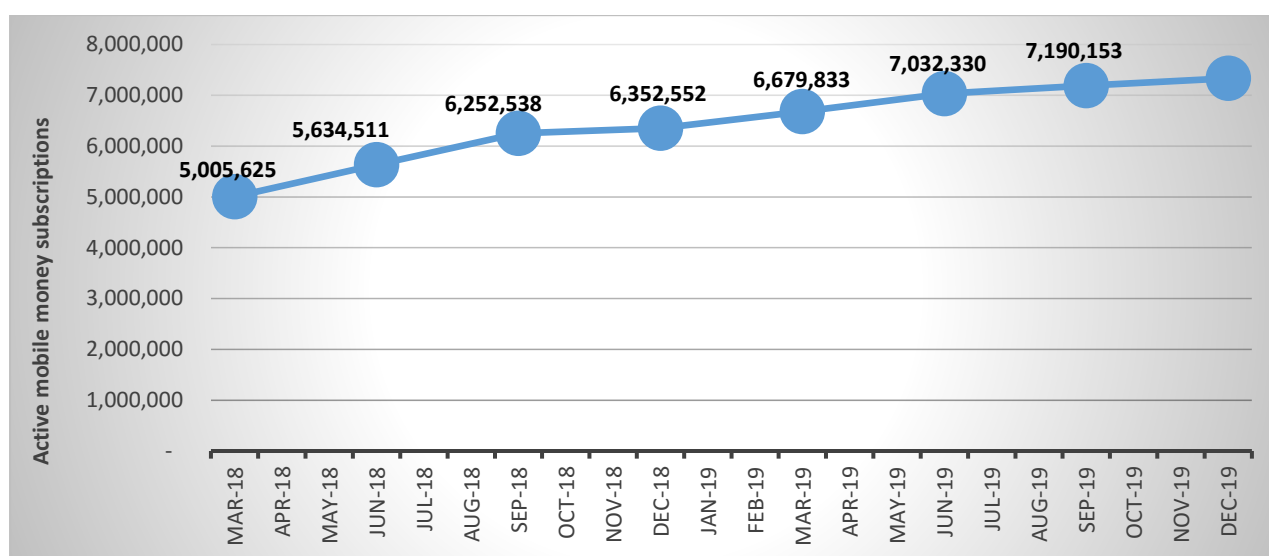
Table 5: Active mobile money subscriptions

	2018	2019	% Growth
Ecocash	6,057,594	6,812,368	12.5%
Telecash	53,392	53,311	-0.2%
OneMoney	241,566	468,960	94.1%

Total	6,352,552	7,334,639	15.5%
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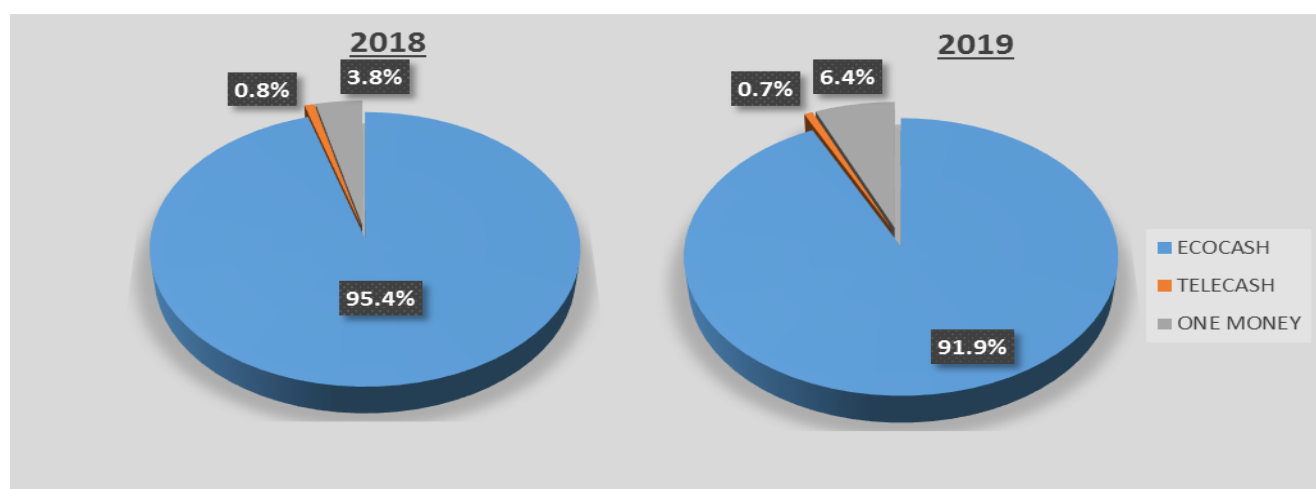
Telecash was the only operator to record a decline in active mobile money subscriptions for a consecutive year. Mobile money subscriptions have been consistently growing as shown below:

Figure 17: Growth in Active Mobile Money Subscriptions



OneMoney recorded the biggest growth in active subscriptions in 2019; as a result, their market share grew by 2.6% to reach 6.4% over the course of 2019 from 3.8% recorded in 2018. Telecel lost 0.1% market share in line with the decline in subscriptions. Econet's market share also declined by 3.5% as shown below:

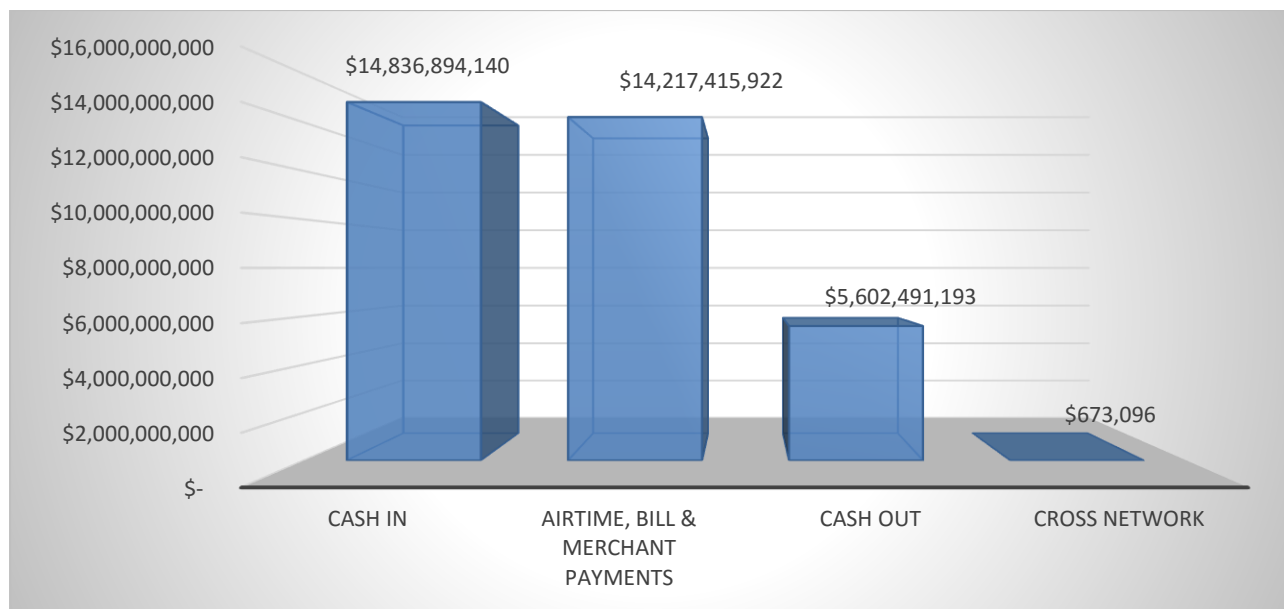
Figure 18: Market Share of Mobile Money Subscriptions



5.2 VALUE OF TRANSACTIONS

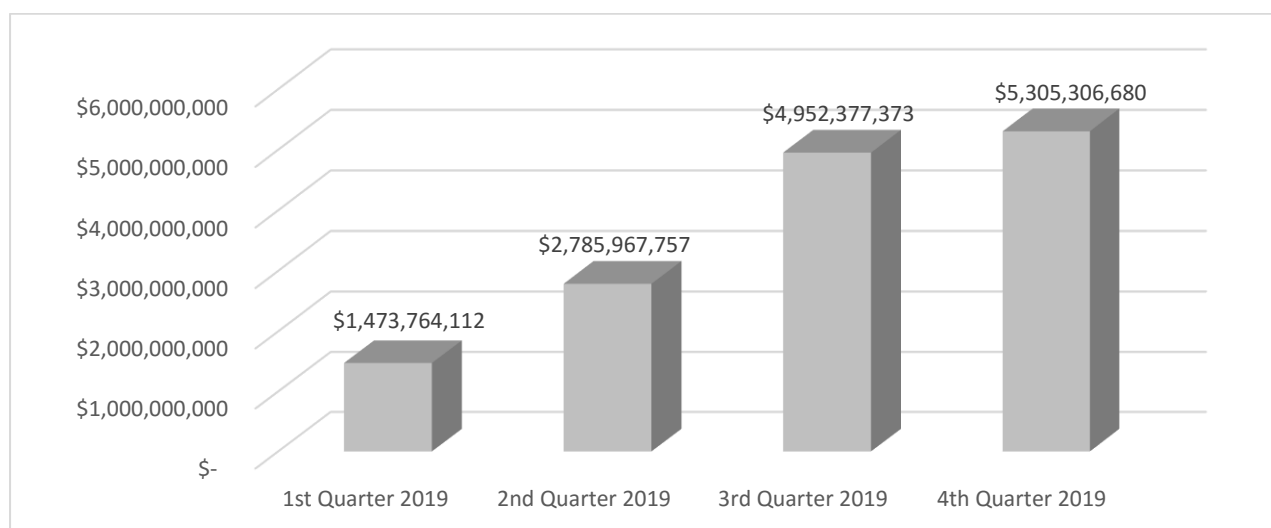
A total of 1,962,223,589 mobile money transactions were processed in 2019. The value of mobile money transactions per transaction category is shown below:

Figure 19: Value of Mobile Money Transactions



Mobile money has become an important channel for effecting Person to Business (P2B) transactions as shown by the growth in the value of airtime, bill & merchant mobile money transactions over the course of the year as shown below:

Figure 20: Airtime, Bill and Merchant Payments



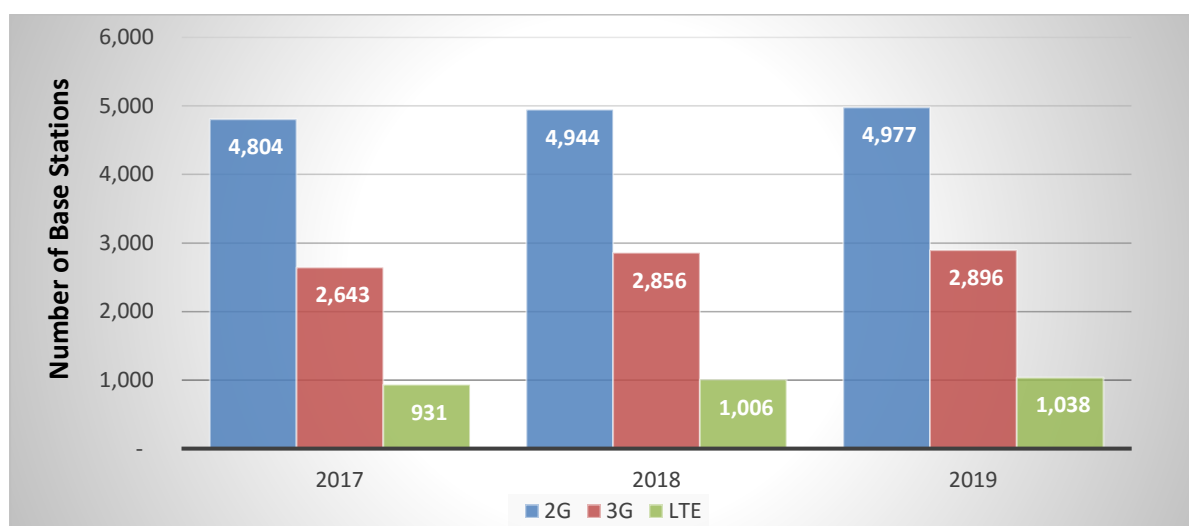
Ecocash processed 99.3% of the total value of transactions; OneMoney processed 0.6% whereas Telecel processed 0.1% of the total value of transactions.

6. TELECOMMUNICATIONS INFRASTRUCTURE

6.1 MOBILE BASE STATIONS

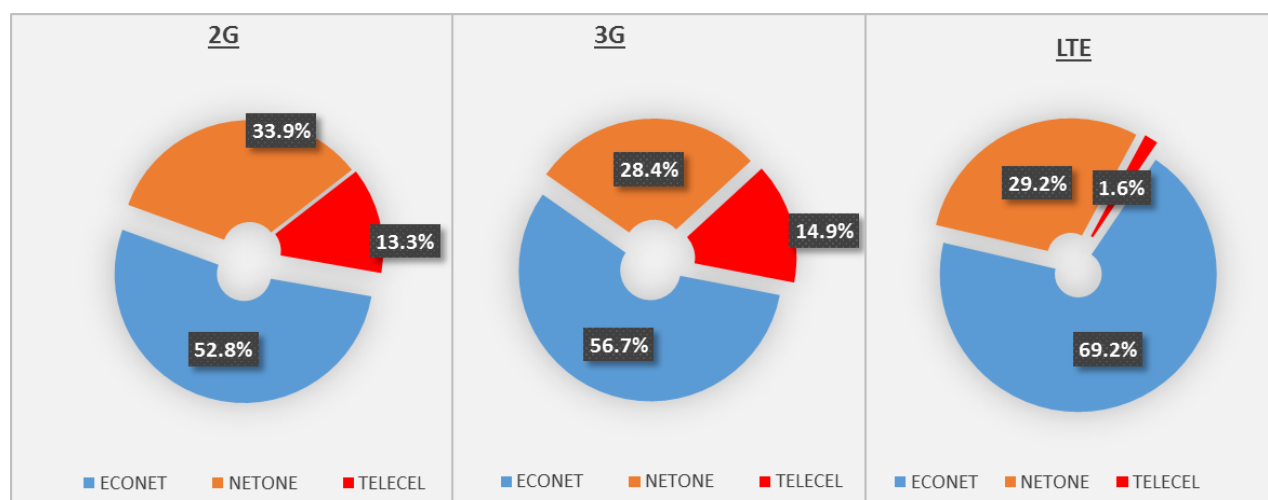
A total 105 new base stations were deployed in 2019. These comprised of 33 new 2G base stations, 40 new 3G base stations and 32 new LTE eNode Bs as shown below:

Figure 21: Mobile Base Stations



As shown above, 3G base stations had the highest number of deployments. The base station deployments resulted in improvement population coverage. 2G network population coverage grew from 92.3% recorded in 2018 to reach 93.4% in 2019; 3G population coverage reached 83.9% in 2019 from 82.3% recorded in 2018; LTE population coverage also improved from 34.8% in 2018 to reach 35% in 2019. Based on the base stations per operator information provided in table 11 above, the market share of mobile base stations was as follows:

Figure 22: Market share of mobile base stations

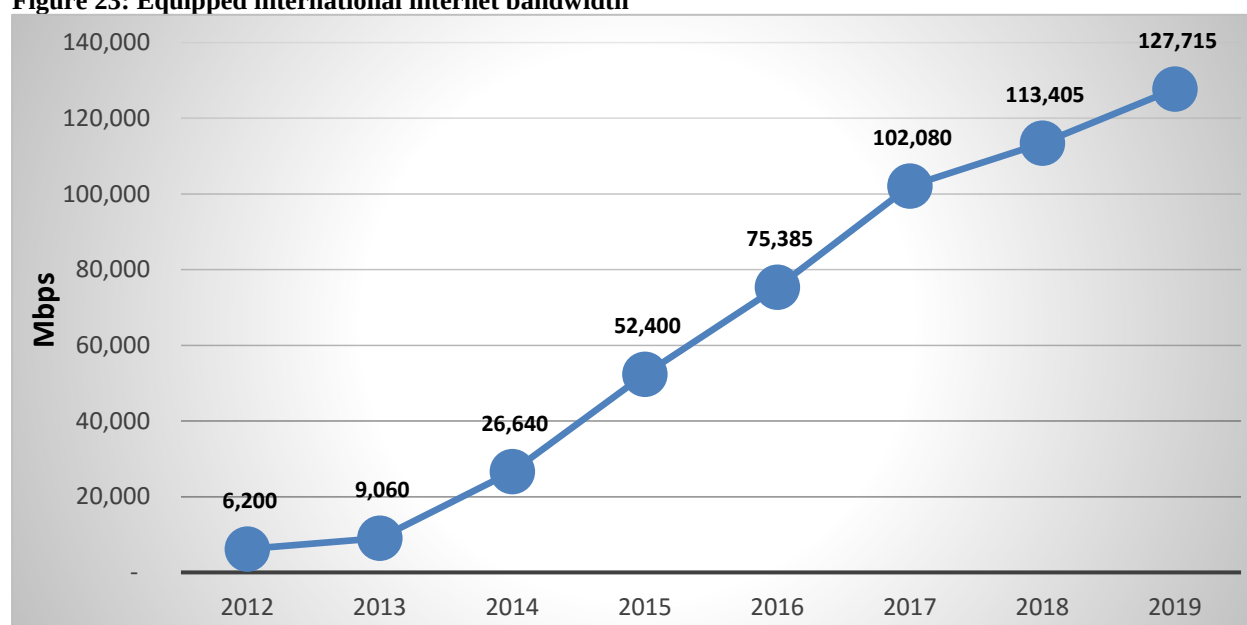


As shown above, Econet had the biggest market share of 2G base stations, 3G base stations as well as LTE eNode Bs implying they have the widest network coverage of all the three technologies in use.

7. INTERNATIONAL INTERNET BANDWIDTH

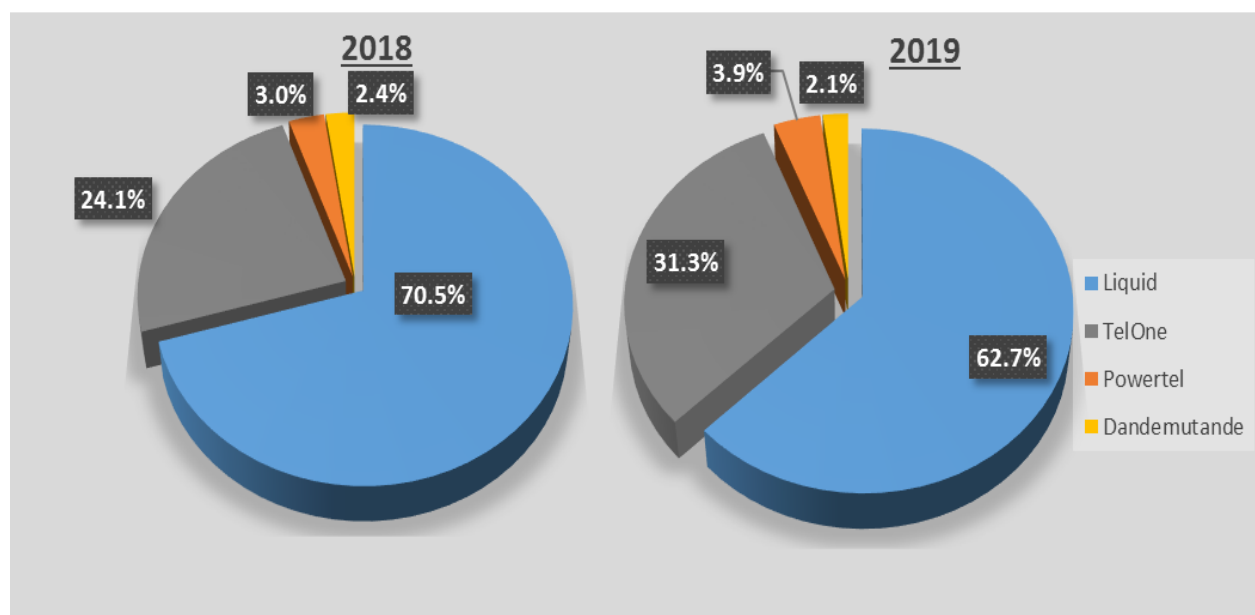
Equipped international incoming internet bandwidth increased by 12.6% to reach 127,715Mbps from 113,405Mbps in 2018. The growth in equipped international internet bandwidth capacity from 2012 to 2019 is shown in the graph below:

Figure 23: Equipped international internet bandwidth



As demand for data and internet services grows, Internet Access Providers have to increase their bandwidth capacities. Of the Internet Access Providers with international internet connectivity, Liquid had the highest equipped international internet bandwidth capacity. An annual comparison of the market share of equipped international internet bandwidth is as follows:

Figure 24: Market share of equipped bandwidth capacity



An annual comparison shows that Liquid and Dandemutande lost 7.8% and 0.3% respectively; TelOne and Powertel gained 7.2% and 0.9% respectively; Powertel's market share remained unchanged at 2.4%.

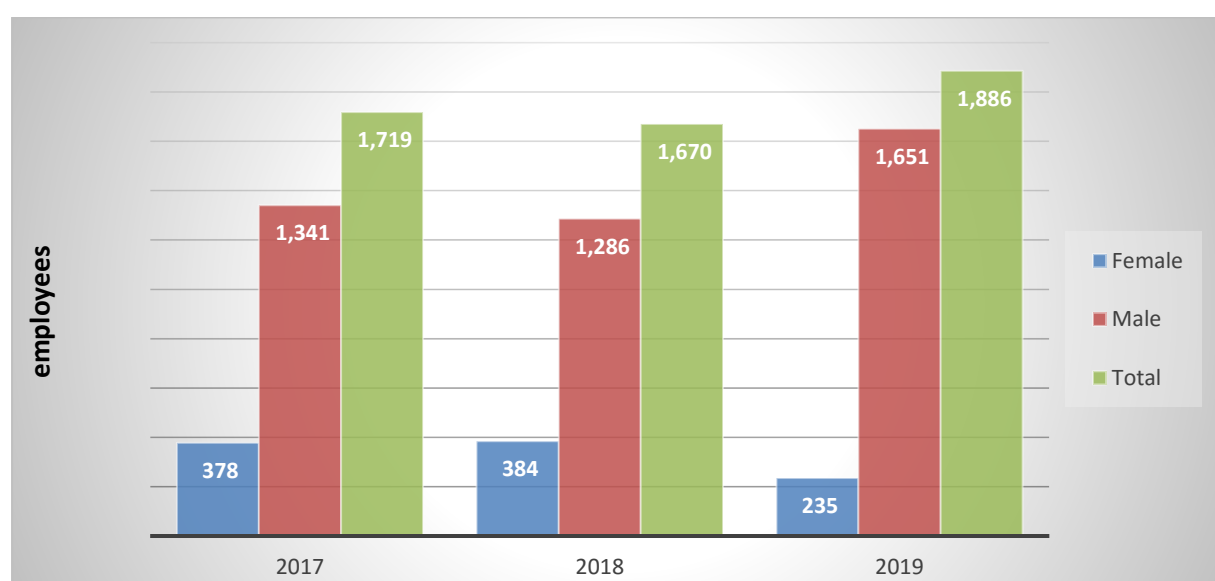
8. EMPLOYMENT

The total number of people employed on a full-time basis in the postal and telecommunications sector declined by 2.7% to reach 6,039 in 2019 from 6,209 recorded in 2018. The proportion of females employed in the sector was 28.5% in 2019 down from 32.5% recorded in 2019. The number of employees is broken down by subsector and by gender as follows:

8.1 FIXED NETWORK

There was overall growth in the number of people employed by the fixed network on a full time basis as shown below:

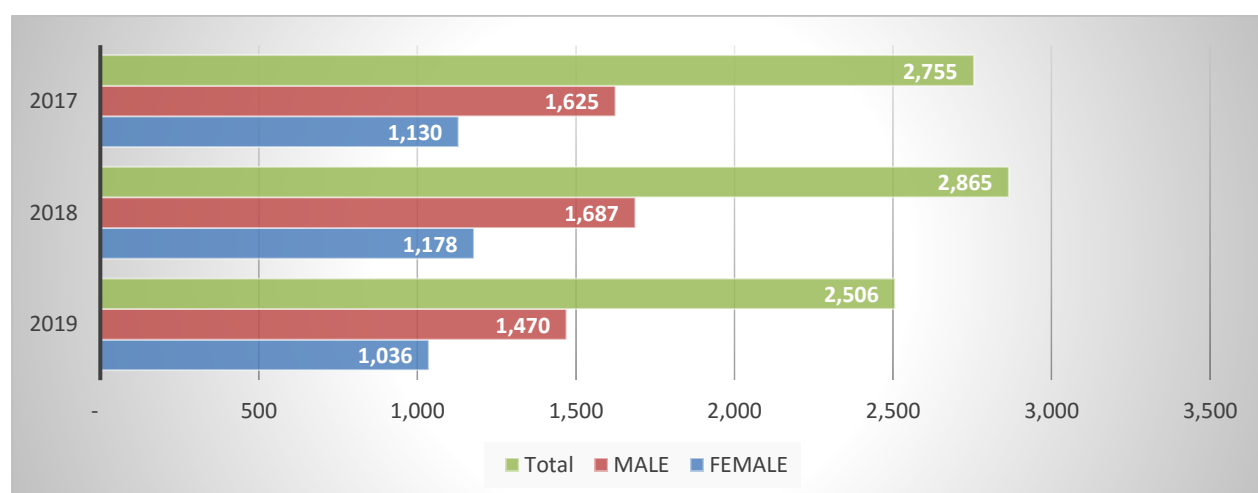
Figure 25: Employment by the fixed network



8.2 MOBILE NETWORK OPERATORS

The mobile network operators employed 2,755 people on a fulltime basis as at 31 December 2018. This represents a 3.8% decline from 2,865 employees recorded in 2018. The total number of mobile network employees is broken down by gender as follows:

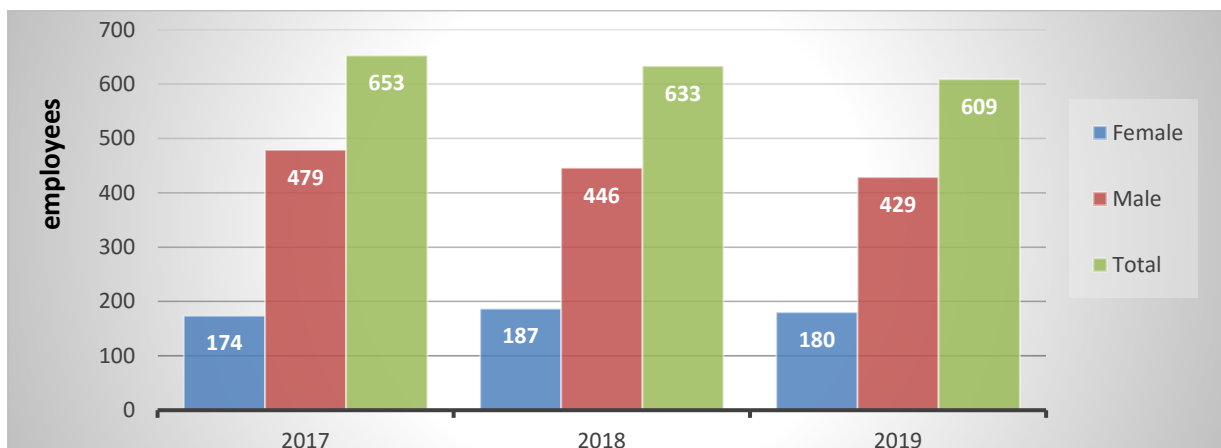
Figure 26: Employment by mobile operators



8.3 INTERNET ACCESS PROVIDERS

The total number of people employed by Internet Access Providers declined by 3.8% to reach 609 from 633 employees recorded in 2018. The employees are broken down by gender as follows:

Figure 27: Employment by Internet Access Providers

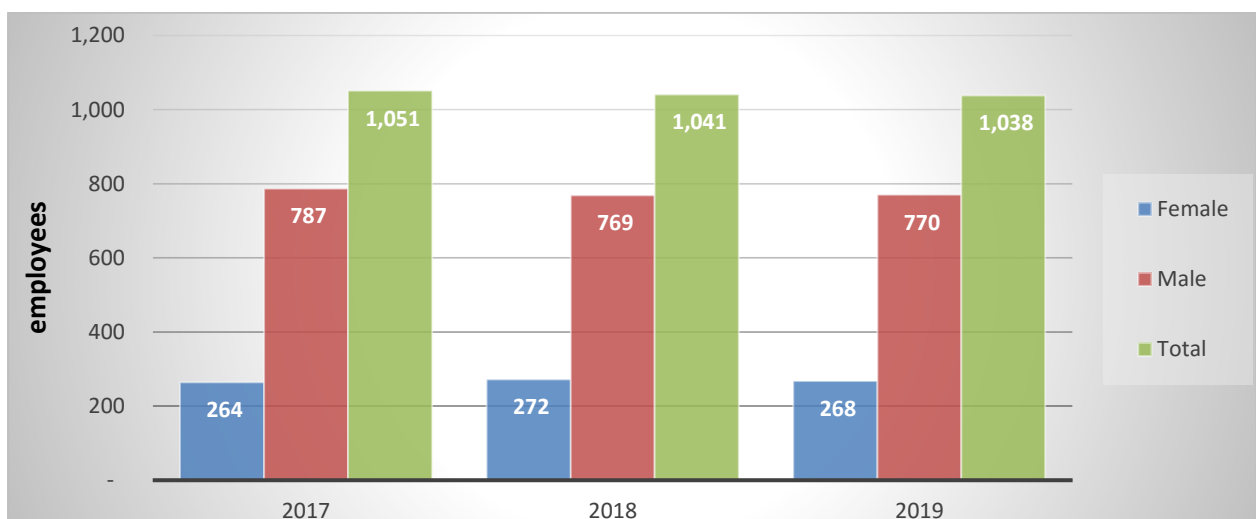


This is a consecutive year in which a decline in the number of employees by Internet Access Providers was recorded.

8.4 POSTAL & COURIER

Postal and courier operators employed a total of 1,038 people as at 31 December 2019, down from 1,041 recorded in 2018. This is also a consecutive annual decline in postal and courier employees as shown below:

Figure 28: Postal & Courier employees



9. OUTLOOK

The performance of the sector in 2020 will be dependent on the general economic environment; the economic environment impacts the sector through service demand and consumption levels, operating costs, investment et.al. The growth of operating costs poses a threat to operator viability and puts pressure on prices. This may in turn impact demand for telecommunication services as consumers reduce usage. The current power supply challenges have negatively affected the sector in terms of service provision, lost potential revenue and increased costs brought about by the use of alternative power sources like generators, in an environment of rising fuel costs.

Data and internet services will continue to drive industry growth, however demand levels for fixed broadband at household level may be negatively impacted by rising prices. The use of Over-the-Top services, such as WhatsApp, Skype and Viber, is expected to grow as consumers cut back on communication expenditure. In the face of depressed demand, operators will continue to focus on new revenue growth strategies and alternative business models. These new business models, mainly around Internet of Things (IOTs), have taken centre stage in many countries and Zimbabwe is following suite.

The three prime drivers of internet use, i.e. availability, affordability and scalability, need to be supported to advance the internet revolution in the country. E-commerce needs to be supported as it is a pillar for postal reform. Mobile money services are expected to continue playing a key role of bridging the financial divide by providing safe, secure and cheap financial services in areas where many Zimbabweans have no access to formal banking systems. Volumes of mobile money payments are expected to maintain an upward trend due to the significant increase in the number of financial services offered on mobile money platforms.

The decline in postal volumes as seen over the years is likely continue. The principal cause of the decline in letter volumes has been the substitution of paper communication by electronic methods (e-substitution). On the other hand, parcel traffic is expected to grow due to e-commerce. The availability of foreign currency will have a positive impact on e-commerce.