



2018 Socioeconomic Survey Report
The Multidimensional Poverty Assessment Tool
in The Kingdom of Lesotho



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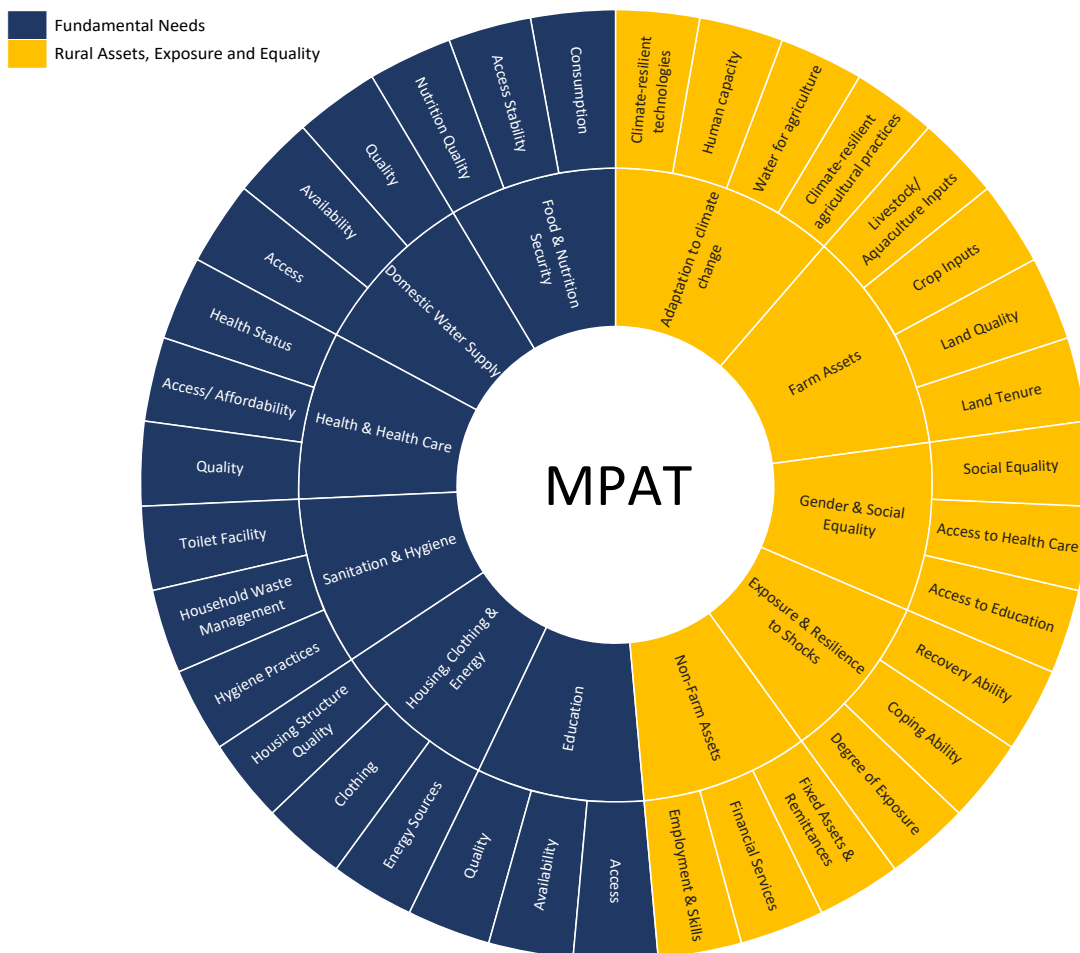
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Introduction



This report describes the design, process, and results of the multidimensional socioeconomic survey conducted in 2017 for the Wool and Mohair Promotion Project (as a baseline) and for the Smallholder Agriculture Development Project (as an end term) in the Kingdom of Lesotho. The objective of the survey was to provide measurements of human well-being, vulnerability and resilience, and land-use practices in communities across the country.

The assessment used a before/after, control/impact (BACI) design. A follow-up survey is scheduled for October 2020 where specific households will undergo the same interview in a panel design. The survey used in this case was IFAD’s Multidimensional Poverty Assessment Tool (MPAT) with approximately 30 additional questions on climate information use, livestock health, and adaptive agricultural practices.

This report disaggregates the survey data by indicator to help the project teams with targeting activities and to provide easily understood results for decision-makers in the project area and in charge of the Lesotho portfolio within IFAD.

The surveys were conducted on tablets using computer-aided personal interviewing (CAPI) and the World Bank’s Survey Solutions software. The English questionnaire was translated into Sesotho, with the help of two locally hired translators who back-translated the questionnaire. The final questionnaire was then revised during the enumerator training and piloting.

The Multidimensional Poverty Assessment Tool

The socio-economic survey was conducted through The Multidimensional Poverty Assessment Tool (MPAT).

MPAT is a participatory means to integrate smallholder farmer perceptions and needs in project design and implementation. It is a survey-based thematic indicator conceived to assist Monitoring & Evaluation (M&E), design, targeting, and prioritisation efforts at a local level. MPAT measures the essential dimensions of rural poverty in order to support poverty-alleviation efforts in developing countries.

The survey instrument has 78 questions that cover food and nutrition security, housing, clothing and energy, education, farm assets, non-farm assets, exposure and resilience to shocks, and gender and social quality. MPAT assesses the overall environment in which people live to determine whether it, and their current state of human well-being, are sufficient to allow them to seek the quality of life that they desire.

The MPAT toolkit includes an excel analysis tool that produces results that are comparable across projects, countries, agro-ecological zones, and continents. The tool weighs, combines, and normalizes results to produce a limited number of summarised scores, ranging from low to high. The excel spreadsheet provided online comes pre-coded with expert-devised values, scores and weightings. MPAT results can be disaggregated by any number of variables to be explored in detail.

If periodic implementation occurs, MPAT data can be used to see changes in time. The data can also be used to compare different groups (with different characteristics) and/or compare groups that have varying levels of participation in project activities. Exploratory analysis to analyse correlations between subcomponents is also possible.

Survey Area: The Kingdom of Lesotho

Since 1995, IFAD grants and loans have supported more than 179, 000 poor rural households in Lesotho through 9 programmes in the country, for a total of \$US78.9 million. The IFAD funded programmes have so far focused on 3 main opportunities for reducing rural poverty: i.) diversifying and intensifying agriculture and livestock production; ii.) rehabilitating and reclaiming degraded lands, including rangelands; and iii.) developing rural financial services to support improved agricultural production and create income-generating activities.

The Wool and Mohair Promotion Project (WAMPP)

Launched in 2016, WAMPP is a 7-year project that aims to boost resilience to the adverse effects of climate change and economic shocks amongst smallholder farmers across the country. The project is national in scope and is made up of 3 components: i.) Climate-smart rangeland management; ii.) Improved livestock production and management; and iii.) Wool and mohair fibre handling and marketing.

Smallholder Agriculture Development Project (SADP)

SADP was declared effective in March, 2012, and aims to increase commercialization of Lesotho's agriculture in two ways: i.) by developing the agricultural business sector; and ii.) through smallholder farmers who are already engaged in market-oriented production or have good potential to become commercially active. The project consists of 3 components to be implemented over 6 years: a) Increasing Agricultural Market Opportunities; b) Increasing Market-oriented Smallholder Production; and c) Programme Management. The project was extended in 2018 through the Lesotho Adaptation for Smallholder Agriculture Project (LASAP).

Sampling

The survey was national in scope, covering all ten districts of the country. The sample for the MPAT survey was designed and prepared by an IFAD M&E and KM specialist, Mr Mohamed El-Ghazaly. The selected technique was that of a stratified random sampling. This involved two main strata: i.) beneficiary stratum: all villages benefitting from the WAMPP; and ii.) control stratum: all villages benefitting from the SADP. The targeted sample for the project was 1,320 households (440 for the SADP stratum and 880 for the WAMPP stratum) to allow for analysis between the two strata and for an analysis by agro-ecological zone (lowlands and highlands within the WAMPP stratum). The target was to reach 20 households within each village, thus reaching out to approximately 36 villages within each stratum. For each selected village, the MPAT village level questionnaire was conducted.

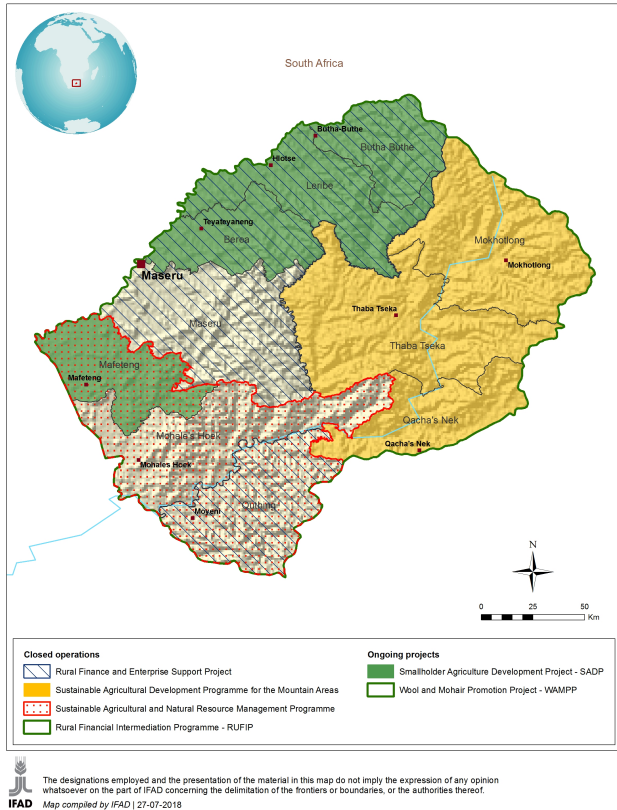


Figure 1: Lesotho ongoing projects

In order to achieve the study objectives and to guarantee an estimate as precise as possible (95% confidence estimate), a minimum sample of 400 households was needed in each stratum based on the sample selection equation that follows:

$$n = \frac{Npq}{(N - 1)D + pq}$$

Where:

n: The sample size.

N: Area population size

P: proportion of occurrence of the event under study. Since there is no prior information this value is estimated by 0.5.

Q: proportion of non-occurrence of the event under study. Since there is no prior information this value is estimated by 0.5.

$$D = \beta^2 / 4$$

β: level of error in the proportion that needs to be estimated (actual value of the proportion in the population - the estimated value from the sample) and usually estimated at 0.05 or less.

Considering a 10% non-response rate, this led to a sample of around 440 households from each stratum. Two sample frames were developed with the

assistance of the WAMPP and SADP M&E officers. Each frame included the list of villages based on the administrative division of the Kingdom of Lesotho: district, constituency, council, and village. The sample was selected in two stages as follows:

First stage

The first stage involved the selection of villages using systematic random sampling. Within each frame, the villages were organized according to the administrative division of the Kingdom of Lesotho. Since the target was to select 20 households from each village, in cases where the total population of a selected village was less than 20 households, the next village was selected to complete the targeted 20 households.

Second stage

The selection of the households in the sampled villages was conducted using a random walk method due to the unavailability of household listing in each village. Each village was divided into 4 clusters (approximately equal in size) with the aim of selecting 5 households from each cluster. This approach was done to adjust the standard random walk method of IFAD to allow for wider coverage within each village. In the few cases where the number of households in the village was smaller than 20, all the households were interviewed without applying the random walk method.

A full list of the villages selected and the distribution



of household IDs can be found in Annex 1, the sample for the MPAT baseline survey.

Data Collection

In November 2017, 16 enumerators and 4 supervisors were trained on MPAT data collection. A field manual with instructions on each question was prepared to help enumerators during data collection. The training

ran for 3 days and included presentations on each of the projects, MPAT and its purpose, the role of the enumerator, enumerator professionalism, interview skills, confidentiality, the role of the supervisor, field logistics and schedules, how to ask each question, and how to overcome challenges in interviews.

Two days of piloting the questionnaire were conducted following the training and before the real data collection period commenced. Each team supervisor, with the help of WAMPP's M&E officer and SADP's M&E officer, made introductions with village elders and representatives and assigned households to each enumerator. Eligible respondents had to be household members of at least 18 years of age whom had spent at least 9 months of the year in the household. Data was collected on android tablets, procured by WAMPP, and the average interview time was of 1 hour.

The team supervisors conducted data quality checking surveys for 10% of all interviews using an abbreviated version of the survey instrument. On a daily basis, the supervisors uploaded the complete interviews to the server, which then went through a data quality checking process by an IFAD consultant based in Rome. The IFAD consultant communicated outliers, errors, and other suspicious data to the team supervisors for corrections before the next day of data collection. The questionnaire offered a number of repetitions with which the internal consistency of the interview could be assessed. For example, households with sloping or steep land were asked specifically if any of their land was terraced. A question later on asked which kinds of soil conservation techniques the household applied on its land, one of which was terracing.

Challenges

The months of November and December are summer months in Lesotho, which in normal conditions would have provided conducive conditions for data collection. However, unexpectedly, the country experienced heavy snowfall during those months. Data collection was thus delayed for two days as roads were blocked by snow.

Moreover, some villages in the rural parts of Lesotho are very remote and difficult to access. In one case, a village could only be accessed by foot or by horseback. This caused some delay, and some change in the enumerator teams to accommodate those most fit to travel. In addition, enumerators struggled to obtain GPS coordinates for each household due to the isolation of some areas and network coverage. With patience and repetition, most GPS coordinates were collected.

Finally, another challenge that the data collection team faced was that a number of schools were closed for the Christmas holidays, which meant that some village level information on education could not be obtained from school teachers as they were not present.

Data Analysis

The analysis of MPAT's data was done using the R software. A standard approach has been used for all the descriptive statistics. For each specific question we tabulated the data and then performed a row/column frequency. For example, when the analysis included the districts, the frequency was calculated within each specific district to have an internal repartition (instead of an overall one). The code used for this was "prop.table".

The data analysis also consisted of grouping the open questions, so that they could be analysed. We created new labels so that they became closed questions (for example "absence of rain" and "not enough rainfall" were grouped as "drought").

The final step of the analysis concerned regressions. For this, a logistic regression model was used. The approach involved the creation of a dummy variable that takes 1 if the studied event occurs and 0 if it did not. In most of the regressions, the explanatory variables are the sex and the age of the household head and sometimes the size of the household. For consistency checking in each regression, the interaction effect was put as a control variable so that the identified coefficient was balanced.

Results

MPAT country profile

The MPAT results aim to provide us with a better understanding of the household situation across Lesotho. The spider diagram, generated by the automated MPAT excel spreadsheet, informs us that in Lesotho the three dimensions requiring most attention are: Adaptation to Climate Change, Exposure and Resilience to Shocks, and Farm Assets. The components in which Lesotho fare best are Gender and Social Equality, and Education.

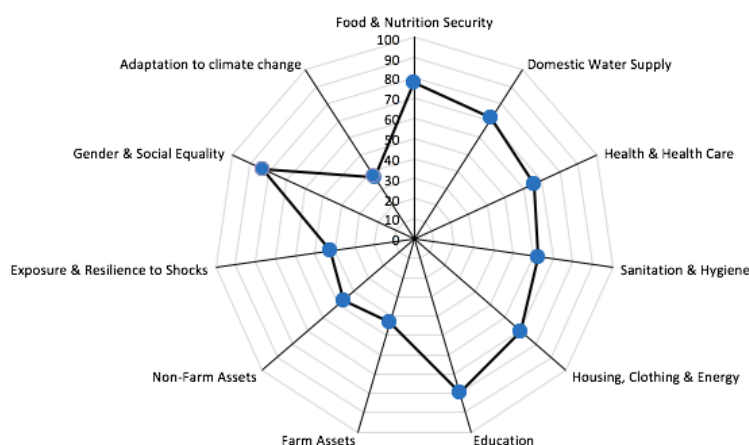


Figure 2: Overall MPAT results on a spider diagram

Table 1, 2, and 3 below present the overall MPAT results; first by component, then the distribution of MPAT scores, and lastly the results by subcomponent. Most of the country’s livelihood dimensions range between 60 and 80 MPAT points.

Table 1: Lesotho’s MPAT score

Table 2: Overall MPAT results

Scores across households	Average	[min, max]
Food & Nutrition Security	77,5	[15, 100]
Domestic Water Supply	71,3	[24, 100]
Health & Health Care	65,8	[24, 99]
Sanitation & Hygiene	62,2	[18, 99]
Housing, Clothing & Energy	70,4	[21, 98]
Education	79,9	[10, 100]
Farm Assets	43,4	[10, 100]
Non-Farm Assets	46,9	[24, 88]
Exposure & Resilience to Shocks	42,3	[10, 100]
Gender & Social Equality	83,0	[26, 100]
Adaptation to climate change	36,6	[10, 76]

Number of MPAT scores	10 Components	31 Subcomponents
Above 80 points	1	8
Between 60 and 80	6	13
Between 30 and 60	4	9
Below 30 points	0	1
Missing data	0	0

Colour code:

Score [80-100]
Score [60-80]
Score [30-60]
Score [0-30]
Missing data (MD)

Table 3: Overall MPAT scores for each subcomponent

Scores across all villages		Average	[min, max]
1. Food & Nutrition Security	Consumption	85,8	[10, 100]
	Access Stability	85,3	[10, 100]
	Nutrition Quality	60,6	[26, 95]
2. Domestic Water Supply	Quality	64,6	[31, 100]
	Availability	77,4	[10, 100]
	Access	76,5	[10, 100]
3. Health & Health Care	Health Status	70,2	[10, 100]
	Access & Affordability	66,6	[13, 100]
	Quality	68,5	[10, 100]
4. Sanitation & Hygiene	Toilet Facility	69,7	[10, 100]
	Household Waste Management	37,5	[16, 78]
	Hygiene Practices	89,8	[32, 100]
5. Housing, Clothing & Energy	Housing Structure Quality	80,6	[10, 100]
	Clothing	78,5	[10, 100]
	Energy	59,1	[20, 97]
6. Education	Quality	75,2	[45, 100]
	Availability	77,2	[36, 100]
	Access	80,6	[10, 100]
7. Farm Assets	Land Tenure	51,7	[10, 100]
	Land Quality	79,0	[18, 100]
	Crop Inputs	54,1	[10, 100]
	Livestock/Aquaculture Inputs	55,1	[12, 100]
8. Non-Farm Assets	Employment & Skills	44,4	[21, 100]
	Financial Services	54,2	[20, 100]
	Fixed Assets & Remittances	47,2	[22, 90]
9. Exposure & Resilience to Shocks	Degree of Exposure	24,2	[10, 100]
	Coping Ability	66,5	[15, 95]
	Recovery Ability	59,7	[10, 96]
10. Gender & Social Equality	Access to Education	84,4	[50, 100]
	Access to Health Care	89,6	[38, 100]
	Social Equality	80,8	[10, 100]
11. Adaptation to climate change	Climate-resilient agricultural practices	46,6	[20, 80]
	Water for agriculture	60,7	[23, 100]
	Human capacity	34,4	[10, 91]
	Climate-resilient technologies	19,4	[10, 68]

The overall MPAT scores suggest that rural households in The Kingdom of Lesotho perceive themselves as having high levels of food and nutrition security, high levels of education, and high levels of gender and social equality.

On the other hand, they perceive to have low levels of adaptation to climate change, high exposure and low resilience to shocks, and low levels of farm assets. The adoption of climate resilient technologies and agricultural practices is very poor across the country.

Respondents noted having a relatively good quality of land, but low levels of human capacity to deal with adapting to climate change. This is worrying, given the fact that households are significantly exposed to climate change in the country, and appear to have a low recovery ability.

The households in the sample indicated that they have a higher coping ability than a recovery ability which suggests that, following a shock (no matter what the shock is), the likelihood of the household remaining in a state of coping rather than reaching full recovery and improving is very high.

In terms of farm assets, one of the worst faring components, households have indicated that they have relatively good land quality, but low levels of land tenure, crop inputs, and livestock inputs. Generally, households did not feel that they had sufficient seed, fertiliser, and livestock feed to meet their agricultural needs.

Almost half of the households own their land through "Common-law Ownership". This refers to a Freehold Arrangement, but without a title or deed to prove legal ownership (i.e. it is not technically legal, but it is expected that the government will likely continue to allow people to use the land). In terms of MPAT, this equals to a low

quality of land tenure because households are susceptible to losing their land, no matter how unlikely it is thought to be.

The component on non-farm assets did not score much higher than the one farm assets, with the lowest faring sub-component being employment and skills. This was due to the majority of respondents noting that they hadn't provided a service or been employed outside of the agricultural sector in the last year. Unfortunately, the inability to diversify income sources directly feeds into a households vulnerability to shocks and stresses.

Households across the country appear to have good hygiene practices, with frequent teeth brushing and use of soap. This, however, is counter-balanced by the relatively poor toilet facilities available. One fifth of the interviewed households practice open defecation, and half of the households use an enclosed improved-ventilation pit.

MPAT scores for household waste management were found to be low, with low access to piped sewage networks and garbage collections. Despite these low levels in waste management, households perceived themselves to be healthy. The access and affordability, as well as the quality of health care was also noted as relatively good. For non-serious illnesses, respondents noted that it would take them, on average across the country, an hour to reach the nearest health centre. For serious illnesses, this average time almost doubled, to around 104 minutes to reach the centre (by any means of transport).

In terms of housing structure quality across the country, MPAT noted that the majority of house roofs were made of metal sheeting. Across the country, a third of households indicated that their households would not withstand severe weather, whilst a third would suffer minor damage.

Only a third of respondents noted that they had stable electricity from a grid as their primary source of energy for light. Other sources of energy included liquid fuel, candles, paraffin wax, and battery powered sources.

The main source of drinking and cooking water appears to be quite varied across and within agro-ecological zones in Lesotho. When taking an overall average across the country, protected springs are the most common main sources of water both in the rainy season and in the dry season, and the second most common source is piped water from a treatment plant (during the rainy season) and from an unprotected spring (in the dry season).

Overall, 72% of respondents indicated that they had sufficient water all year round and the majority of households perceived the water to be of good or very good quality.

In terms of food and nutrition security, almost half of the households across the country never had to forego food due to shortages. Households that did indicate having to skip meals or reduce portions were likely to have done so only once or twice in last 12 months. The stability of food access is relatively high in the country, with the majority of the respondents indicating that the household never went for more than two weeks without enough food, and never went for a full day without any food. That said, diet diversity and nutrition quality is recorded as low. Members of a household eat grains every day (pap) but almost never or very infrequently eat meat, roots, and fruits, and rarely consume dairy products or eggs on a daily basis.

The second best faring component in MPAT was education, and in particular, the access to education. Almost every child between the ages of 5 and 14 years in our sample regularly attended school and only a very small portion of the respondents indicated that they couldn't or could rarely afford the school costs. The remainder of the respondents either could pay for the costs, or didn't need to because these costs were covered by the State.

The best faring component, on gender and social equality, is a cross-cutting theme and included questions on access to health, access to education, and on unequal opportunities. When asked about expectations of achieving higher education levels, the expectations were similar for girls and for boys. Girls were actually expected to achieve a slightly higher education level than boys.

In terms of which gender had a better chance of receiving health care, the vast majority of respondents indicated that they believed women and men would have about the same chances in receiving health care when needed. Separating the results by gender of the respondent shows similar results for both groups.

MPAT asks respondents whether they believe that there are households in their area with fewer economic or political opportunities than others because of their religion or ethnicity/minority group. A little above half of the respondents said that these inequalities did not exist in their area. Those that did indicate that inequalities existed, expressed that less than half of the households in the area experienced these inequalities.

The following sections will outline the MPAT results in more detail.

Respondent Characteristics

As previously mentioned, respondents had to be minimum of 18 years of age, and live in the household for at least 9 months of the year. Ideally, interviews were carried out with one respondent but if the respondents chose to have their spouse or close family member involved in order to aid in remembering answers, this was permitted. In rural areas, it is not uncommon for neighbours and friends to drop by and to observe the interview. In these cases, we instructed enumerators to politely ask observers to allow for private interviewing- regardless of whether the respondent allowed them to stay or not. In the cases where observers refused to leave, MPAT interviews were stopped in order to avoid any incorrect answers resulting from consideration of observer judgement.

Respondents had the choice of taking the survey in English or in Sesotho. Around half of the interviews were conducted in Sesotho (48%). However, this was because interviewers had chosen to see the questions and write the answers on the tablets in English, but to interpret and speak with the respondent in Sesotho.

59% of the total respondents were male, and in general, it was the household head who was interviewed (99%). The average age of the respondents was 55 years, and the most common main occupation cited was farmer or livestock keeper (33%). The second most common occupation listed was 'spouse'. Women listed their main occupation as 'spouse' rather than farmer or livestock keeper, even if this was their main activity.

45% of respondents in Mokhotlong, a mountain area district, indicated that they were farmers or livestock keepers which was the highest proportion captured through the MPAT survey. The district with the lowest number of respondents indicating that they were engaged in farming as their main activity was Leribe (29%) followed by Mafeteng and Mochale's Hoek (32%). In Thaba-Tseka, 28% of respondents indicated that they were employees. This is higher than the 21% recorded in Maseru, the capital.

Table 4: Respondents Main occupations

District	Farmer/Livestock keeper	Employee	Own business	Day labourer	Housewife	Student	Other
Berea	39	16	4	5	35	0	1
Botha-Bothe	30	21	5	13	29	0	3
Leribe	29	22	10	11	26	0	3
Mafeteng	32	19	8	10	28	0	3
Maseru	39	21	10	10	17	1	3
Mochale's Hoek	32	13	9	5	39	0	2
Mokhotlong	45	10	5	3	30	2	5
Qacha's Nek	35	18	8	8	33	0	0
Quthing	36	13	8	10	30	2	2
Thaba-Tseka	33	28	7	5	27	0	0
Overall	33	19	8	9	28	0	2
n	439	248	105	117	371	3	32

Table 5: Household Head literacy rate

District	Can read without difficulty	Can read with difficulty	Cannot read a new paper	Don't know
Berea	55	26	18	0
Botha-Bothe	55	29	15	0
Leribe	58	29	13	0
Mafeteng	63	25	12	0
Maseru	66	25	9	0
Mochale's Hoek	61	19	18	2
Mokhotlong	37	40	23	0
Qacha's Nek	58	23	18	3
Quthing	52	33	15	0
Thaba-Tseka	40	25	35	0
Female head	59	31	10	0
Overall	57	27	15	0

Household characteristics

MPAT defines a 'household' as a housing unit in which a group of people reside, who usually eat and sleep together and share resources. Another way of understanding the definition of a household is based on joint cooking and eating. That is, if two families almost always cook and eat together, they can be considered as one household, even if they do not sleep in the same physical structure.

For the purposes of the MPAT survey, household members may also include people who spend 9 or more months of the year living and working outside of the household, have the potential to send money back to support the household, and still consider themselves part of the household and that area/village to be their home. Household members who are living outside the household/village (more than nine months per year) for the purpose of studying *full-time* (university, trade school, etc.) or who are at boarding school are also included, as long as they are still dependent upon the household financially. People hired to work in the home are only

considered household members if they both sleep and eat in the household.

Under this definition, the average household size for the whole survey area was 5 (max=15; min= 1). Out of the entire sample, 4% of the households had only one member (the average age of single household members is 60 with 6% of women and 3% of men). The average age of the household head was 51 for men and 61 for women. Overall, 41% of the household heads were female. Where relevant, we will be presenting indicator results for female-headed households separately.

The majority (85 %) of male heads of households were married, compared to only 2% of female heads of households. The majority of female heads of households (87%) were widows.

Most of the household heads were farmers or livestock keepers (34%) and housewives (28%). Almost two thirds of the female heads of households indicated that they were housewives, which can be explained by their age.

Table 6: Household Head characteristics

District	Mean HH size	Mean age HH head	Female HH head (%)	Mean age male HH head	Mean age female HH head
Berea	5	53	46	49	59
Botha-Bothe	5	54	43	49	60
Leribe	5	55	37	52	60
Mafeteng	5	55	43	52	60
Maseru	5	54	36	52	58
Mohale's Hoek	4	58	44	51	66
Mokhotlong	5	55	35	49	66
Qacha's Nek	5	55	43	48	65
Quthing	5	58	45	55	61
Thaba-Tseka	5	51	37	44	63
Overall	5	55	41	51	61

Table 7: Household Head Main occupation

District	Farmer/Livestock keeper	Employee	Own business	Day labourer	Housewife	Other
Berea	39	15	4	6	35	1
Botha-Bothe	30	21	5	13	28	3
Leribe	29	22	10	11	25	3
Mafeteng	32	19	8	10	28	3
Maseru	39	21	10	10	17	4
Mohale's Hoek	32	13	9	5	39	2
Mokhotlong	43	10	5	3	30	8
Qacha's Nek	35	20	8	8	30	0
Quthing	38	13	8	10	28	2
Thaba-Tseka	33	28	7	5	27	0
Female headed	9	10	7	5	66	3
Male headed	51	25	9	12	1	2
Overall	34	19	8	9	28	3

In general, 54.5% of male heads of households were literate, compared to 57% of female heads of households. Overall, 57% of respondents were

literate, and Maseru was the district with the highest proportion of literacy (66%).

Lesotho has a relatively young population, with women living longer than men, as demonstrated by the age pyramid below.

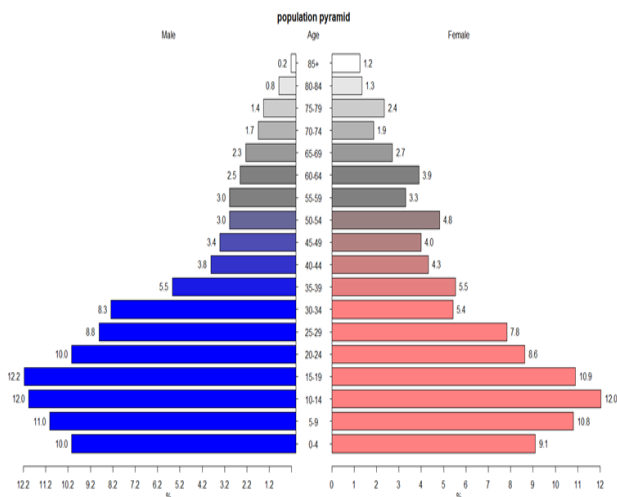


Figure 3: Age pyramid of MPAT respondent

Education

Of the households interviewed that had children, it was recorded that 96% of children aged between 5 and 14 years regularly attended school, and that 98% of those children travelled to school each day, with the remaining 2% living at the respective schools.

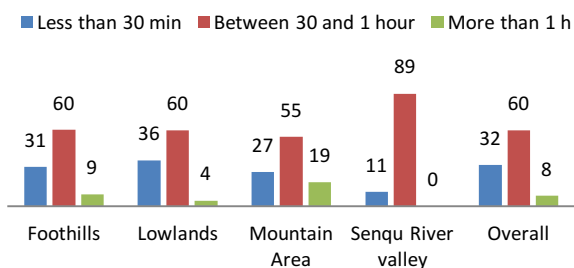


Figure 4: Average time to reach school per agro zone

On average, it takes 40 minutes one way for children to reach the school by any means (foot, bike, car, bus, etc.).

Household Characteristics

The majority of household heads were married men. Some household heads were women, the great majority of which were widows.

A little above half of household heads are literate, with higher literacy rates among women than men.

The average age of the household head is 51 years old, and the average size of a household is 5 people.

There are clear differences between the average times in each agro-ecological zone: 35 minutes in the lowlands, 43 minutes in the foothills, and 52 minutes in the mountain areas. The maximum time taken to reach school was of 240 minutes, recorded for 4 children, all of whom lived in the same district, Botha-Bothe, a mountainous district.

MPAT enquires whether households are able to pay for their children's school fees. The majority of the households in each district except Mokhotlong claimed that they do not need to pay for school fees as this is covered by the State. Table 12 shows the differences in ability to pay for school fees in each district. The proportion of households that said that they were never able to afford school costs is very low. On the other hand, only 21% of households across the country seem to always be able to afford costs. This suggests that a change in school fees whereby households will have to cover the costs themselves could severely affect a household's wellbeing.

Table 8: Household's ability to pay school fees

District	No/Rarely	Sometimes	Usually/Yes	Household does need/Cannot afford	Household does not need to pay/Can afford	Household does not need to pay fees and supply costs
Berea	9	1	13	7	4	66
Botha-Bothe	6	5	27	5	13	42
Leribe	7	8	34	5	3	43
Mafeteng	3	5	31	7	13	41
Maseru	2	3	21	8	11	55
Mohale's Hoek	4	6	22	4	6	57
Mokhotlong	25	9	16	9	6	34
Qacha's Nek	6	0	10	0	3	81
Quthing	7	2	7	7	2	73
Thaba-Tseka	6	3	14	3	17	57
Female head	8	5	20	7	6	54
Male headed	5	5	27	5	9	48
Overall	6	5	24	6	8	51

Female-headed households appear to be able to afford school costs less often than male headed households: 7% of respondents in female headed households said they were not or rarely able to pay vs 5% in male-headed households¹.

Respondents were asked what expectations they had about the highest level of education that their 0-14 year old children would complete. Emphasis was placed during the training to explain that this question does not refer to the level of education that respondents *hope* would be achieved, but rather what they *expect*. This was asked separately for boys and girls. In general, there are similar expectations for girls and boys, with a slightly higher expectation of girls achieving higher educational levels than boys.

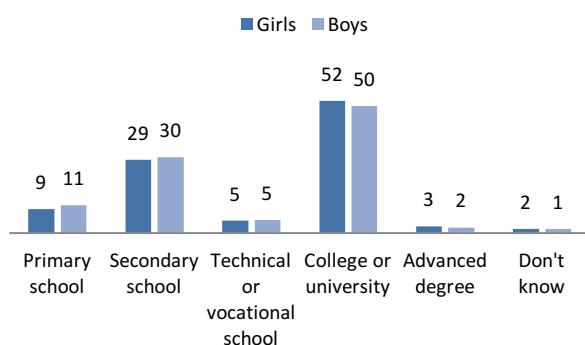


Figure 5: Expectation of school achievement

Around 50% of households expected their children, regardless of the sex, to obtain a University or College degree. When it came to households with children of both sexes, 90% of the respondents expected equal levels of education for boys and girls.

¹ In a logistic regression (dependent variable coding 1=no/rarely; 0=other answers) with household head age and gender and household size as independent variables, all three variables had significant coefficients. Larger households, female headed households, and older household heads were less likely to afford school costs.

Education

The vast majority of children regularly attend school, and most households can cover the cost of schooling because it is covered by the State.

Health

MPAT enquires about the frequency of illness in a household, and differentiates between a serious illness and non-serious illnesses. Illnesses are considered serious when they prevent the individual from carrying out daily activities. Prevalence of HIV among adults ages 15 to 59 years in Lesotho is 25.6%: 30.4% among females and 20.8% among males, corresponding to approximately 306,000 people living with HIV between the ages of 15 - 59 years in Lesotho².

MPAT does not question respondents on HIV. Instead, respondents are free to judge whether an illness experienced is considered serious or not, based on its impact on their lives. As HIV does not hinder daily activities in most cases, the MPAT does not necessarily consider it to be a serious illness.

The answer options for frequency of illness in the household in the previous 12 months are: never, rarely, sometimes, often, and always. Because of the difficulty that some respondents had with scaled questions, we report the answers for the section in three groups: 'Never & Rarely', 'Sometimes', and 'Often & Always'.

Serious illnesses occurred less frequently than non-serious illnesses: 66% of the households had never or

² ICAP (2017). *Lesotho Population-Based HIV Impact Assessment 2016-2017* [online] Available at: https://phia.icap.columbia.edu/wp-content/uploads/2018/02/Lesotho-Summary-Sheet_A4.2.7.18.HR_.pdf

rarely experienced any occurrence, there had been some occurrences in 20% of the households, and in 14% one or more members often or always had a serious illness. Non-serious illness occurred more frequently, with a third of households indicating that they always or often experienced a non-serious illness. MPAT results shows that female headed households experienced a higher frequency of both serious and non-serious illnesses.

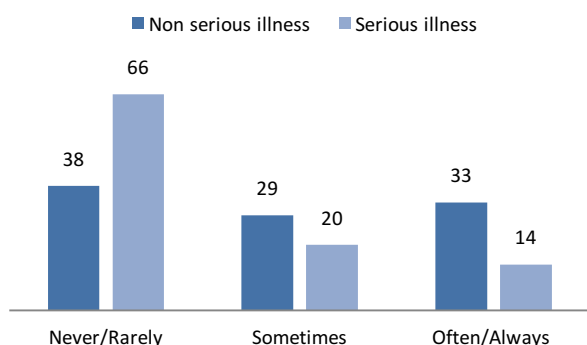


Figure 6: Occurrence of non-serious/serious illness

This could be explained, in part, by the age of the household head. Most female heads of households were elderly and widows. Maseru was the district in which the most households never or rarely experienced a non-serious illness (45%) whereas in Qacha's Nek, 41% of households had experienced a non-serious illness in the last 12 months. Botha-Bothe and Maseru both had large proportions of households (above 70%) that had never or rarely experienced a serious illness in the last 12 months. On the other hand, Berea, the district with the least recorded non-serious illnesses, had the largest proportion of households experiencing a serious illness in the last 12 months (19%).

In all the agro-ecological zones, except for the lowlands, it was more frequent for a household to often or always experience a non-serious illness than to never or rarely experience this. The opposite goes for serious illnesses. In each zone, we can see that on

average, 68% of households never/rarely experienced a serious illness.

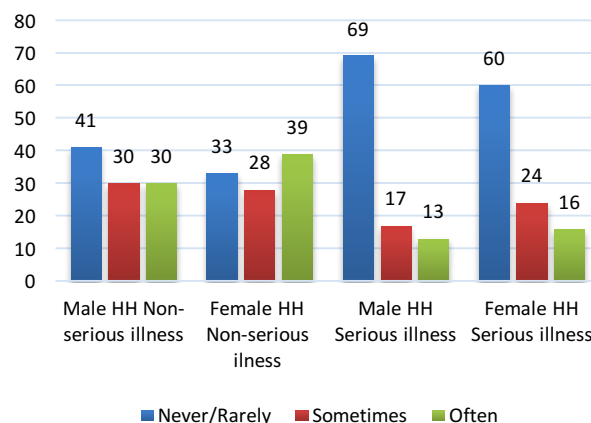


Figure 7: Occurrence of illness per gender

Across the country, the average time taken to reach a health centre that can treat simple injuries or prescribe basic medicines, by any means (on foot, by car, by bike, by horseback), is 62 minutes. Three quarters (75%) of respondents claimed that it took 60 or less minutes to get to such clinics.

On the other hand, the average time taken to reach a health centre that can treat severe illnesses (that can perform surgery) is 104 minutes, and only 47% of households responded that it took them one hour or less to reach that health centre. In some cases, it was noted that it took respondents less time to reach a clinic for severe illnesses than for minor illnesses. The reason for this was that respondents took a different means of transport to reach the further clinic. This is problematic in terms of analysing data, but the reason MPAT asks for the time taken, rather than the distance, is to assess accessibility and to perceive the time cost. A third of the respondents indicated that it took the same amount of time to get to centres that deal with simple and major injuries, whilst a little more than half of respondents indicated that it would take longer to reach the health centre that treated serious illnesses and grave injuries.

Table 9: Average time needed to reach the nearest health centre for non-serious illnesses per agro zone

Agro zone	Mean travel time to the health centre (min)	less than 15 minutes	16-30 minutes	31-60 minutes	More than 60 minutes
Foothills	94	3	13	37	48
Lowlands	44	12	41	36	12
Mountain Area	85	13	19	25	43
Senqu River valley	30	69	12	8	12
Overall	62	11	31	33	25

Table 10: Average time to needed reach the nearest health centre for serious illnesses per agro zone

Agro zone	Mean travel time to the health centre (min)	less than 30 minutes	31-60 minutes	61-120 minutes	More than 120 minutes
Foothills	131	9	21	7	63
Lowlands	66	34	30	15	22
Mountain Area	128	11	25	7	57
Senqu River valley	137	0	4	12	85
Overall	91	24	27	12	38

In regards to the nearest health centres that could treat simple injuries or illnesses, respondents were asked their opinion on the state of medical supplies and

whether they believed them to be sufficient or not. On average, 38% of households indicated that these nearest health centres always have sufficient medical supplies and only 2% of households believe that the health centres never or rarely have enough.

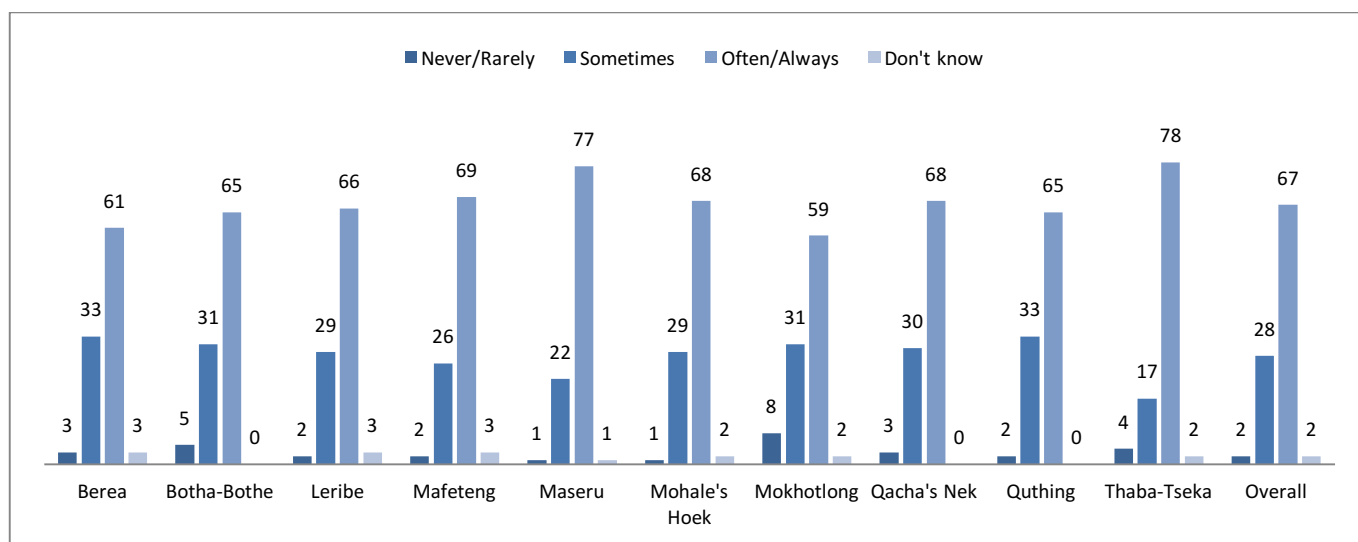


Figure 8: Ability of the health centre to treat non serious illness per district

When comparing results by agro zone, the Senqu River Valley is the area in which most respondents believe that the centres do not have sufficient medical supplies.

Respondents are then asked if the household can afford medical treatment. Respondents have a choice

of the following answer options; No, Yes if money is borrowed, Yes with much difficulty, Yes with some difficulty, Yes because the government or the employer helps pay for the treatment, and Yes the household can afford it.

Table 11: Time taken to reach health centres per district

District		% of households requiring 0-15 minutes	% of households requiring 15-30 min	% of households requiring 30-60 min	% of households requiring 60+ minutes	Average time
Berea	Non-serious illness	5	24	30	41	95
	Serious illness	3	21	17	39	119
Botha-Bothe	Non-serious illness	8	21	30	42	79
	Serious illness	6	9	23	47	115
Leribe	Non-serious illness	9	35	46	10	46
	Serious illness	3	16	34	37	83
Mafeteng	Non-serious illness	11	40	30	18	48
	Serious illness	9	32	20	28	68
Maseru	Non-serious illness	16	46	20	18	46
	Serious illness	8	19	27	28	84
Mohale's Hoek	Non-serious illness	30	18	30	22	54
	Serious illness	12	20	24	18	92
Mokhotlong	Non-serious illness	24	12	22	42	80
	Serious illness	2	2	25	29	146
Qacha's Nek	Non-serious illness	0	13	28	60	116
	Serious illness	0	5	31	41	126
Quthing	Non-serious illness	12	20	42	27	64
	Serious illness	0	2	8	73	119
Thaba Tseka	Non-serious illness	2	34	29	36	78
	Serious illness	2	27	49	14	64

Overall, 32% of respondents indicated that they could afford medical treatment. A greater proportion of male headed households could afford treatment (37%) than female headed households (25%). Again, this could be explained in part by the fact that the majority of female headed households were widows. 38% of respondents in two districts, Mokhotlong and Qacha's Nek, indicated that they were unable to afford treatment (38%). On the other hand, Maseru and Mafeteng had the highest levels of respondents indicating that they could always afford treatment (39%).

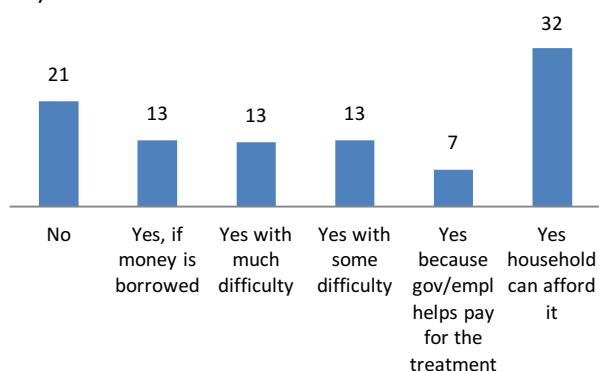


Figure 9: Ability to afford medical treatment

Almost a third of the overall sample said that they can afford treatment. The two districts in which the highest percentage of households indicated that they could afford treatment (39%) was Mafeteng and Maseru. The district in which most households responded that they could not afford treatment were Mokhotlong and Qacha's Nek (38%). Not surprisingly, Mafeteng and Maseru are districts that are mainly lowlands and closest to the capital. Mokhotlong and Qacha's Nek, however, are two of the most remote districts that are completely covered in mountain areas.

Two questions relating to gender equality in health care were then posed to the respondents. The first asked whether men or women had a better chance of receiving health care when needed. The far majority of respondents (90%) indicated that they believed women and men have about the same chances in receiving health care when needed. 2% indicated that they didn't know, 8% indicated that women had a better chance, and 0% of respondents indicated that men would have a better chance of receiving health

care when needed³. Separating the results by gender of the respondent shows similar results for both groups (92% of women responded 'about the same' and 88% of men responded 'about the same' whereas 6% of women responded 'women' whilst 10% of men responded 'women').

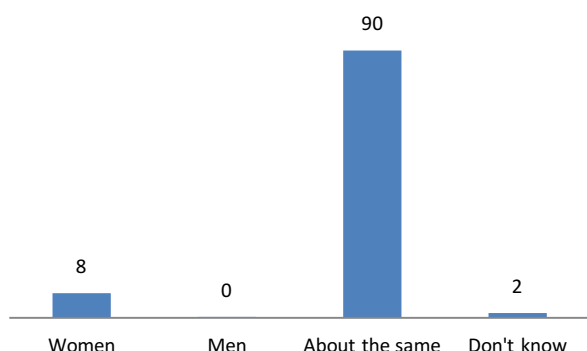


Figure 10: Access to healthcare disaggregated by gender

The second question asked whether women would receive adequate health care from the health centre in the area if they sought it. The answer options were 'no', 'rarely', 'sometimes', 'often', and 'always'.

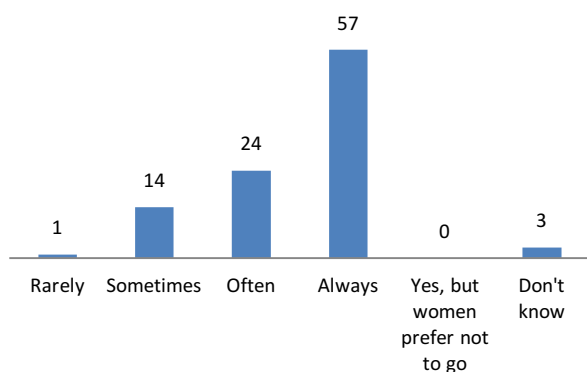


Figure 11: Women's access to adequate healthcare

The answers are difficult to interpret, as it remains unclear whether respondents feel health facilities are able to provide adequate care in general or to women in particular. Judging from the answers to the previous questions, these results seem more likely to reflect a general assessment of health facilities than availability of adequate care for women specifically.

Health

Non-serious illnesses are more frequent than serious illnesses. A third of households always, or very often, experience a non-serious illness by at least one member of their household.

The average time taken to reach a health centre that can treat severe illnesses is around 2 hours.

Less than half of the respondents believe that the nearest health clinic that can treat simple illnesses always has enough medical supplies.

More than half of the households cannot afford medical treatment, or can afford it but with some level of difficulty.

³ Of the 1320 respondents, 3 respondents (male) indicated that they believed men would have a better chance of receiving health care when needed.

Housing conditions - building materials

The majority of houses in the survey area had walls made of cement blocks (48%) or stone and mortar

Table 12: Main building material for household walls per district

District	Stone and mortar	Cement block	Brick (fired/burned)	Metal sheeting	Brick(mud/earth)	Mud/straw	Others
Berea	44	37	0	2	3	13	1
Botha-Bothe	43	45	2	3	3	4	0
Leribe	23	61	3	4	4	4	2
Mafeteng	35	51	8	1	2	2	1
Maseru	35	61	1	0	1	1	0
Mohale's Hoek	49	45	2	0	2	2	0
Mokhotlong	80	10	0	0	2	8	0
Qacha's Nek	63	28	0	0	8	3	0
Quthing	43	42	2	2	5	3	3
Thaba-Tseka	73	20	2	0	0	5	0
Female headed	42	46	3	1	3	5	1
Male headed	38	49	3	2	3	3	0
Overall	40	48	3	2	3	4	0

Across the country, the majority of house roofs were made of metal sheeting (69%). Less common materials were straw or reeds (23%) and roofing shingles (8%). On average, male headed households were more likely to have roofing shingles than female headed households. Across Lesotho, 33% of households indicated that their households would not withstand severe weather, and 12% responded that their households would withstand severe weather with significant damage, while 36% would suffer minor damage.

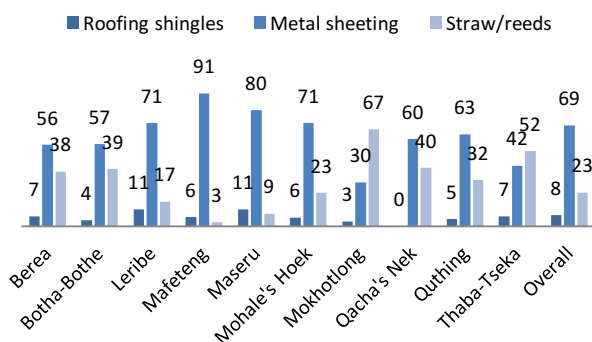


Figure 12: Main household roofing material per district

18% of total households indicated that their households would withstand the weather. 21% of male headed households believed that their households were capable of withstanding severe weather, as opposed to 14% of female headed households. A higher proportion of households in the mountain areas indicated that their households would not be able to withstand severe weather.

(40%). The other 12% of houses had walls made of metal sheeting (2%) fired bricks (3%) mud and straw (4%) and mud bricks (3%). Table 12 shows large differences between the districts. There appears to be no major differences between male headed and female headed households.

Legend for Figure 13:
 ■ No
 ■ Yes
 ■ Yes with minor damage
 ■ Perhaps, but with significant damage likely

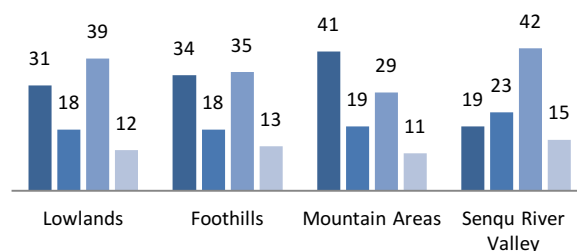


Figure 13: Capacity of households to withstand severe weather per agro zone

Housing conditions – Fuel

Only one household in Mafeteng indicated that they did not have any fuel for light. All other households responded positively, with the most common source being stable electricity from a grid (35%). Other sources included liquid fuel (33%), and 'candles, paraffin wax or a battery powered source' (28%). Table 13 presents these sources and the differences across districts. Leribe is the only district where more than half the households use stable voltage electricity as their main source of fuel for light. Mokhotlong, on the other hand, only had 3% of households using stable electricity, and 55% of households using liquid fuel as a source of light.

Table 13: Primary source of energy for light per district

District	Electricity grid	Solar/wind/dam	Gas/Liquid fuel	Candle/battery/paraffin wax
Berea	26	0	36	38
Botha-Bothe	17	6	45	33
Leribe	54	6	19	22
Mafeteng	45	1	31	23
Maseru	38	1	36	25
Mohale's Hoek	14	2	43	41
Mokhotlong	3	3	55	38
Qacha's Nek	40	0	38	23
Quthing	30	2	38	30
Thaba-Tseka	12	2	54	33
Overall	36	3	33	28

Table 14: Primary source of energy for cooking per district

District	Electricity grid	Gas fuel	Liquid fuel	Wood/sawdust/grass
Berea	4	15	6	75
Botha-Bothe	8	13	8	71
Leribe	9	30	7	55
Mafeteng	8	34	8	50
Maseru	6	41	4	49
Mohale's Hoek	3	30	7	60
Mokhotlong	0	17	5	78
Qacha's Nek	8	13	3	78
Quthing	5	17	12	67
Thaba-Tseka	0	13	0	87
Overall	7	26	7	60

Table 15: Primary source of energy for heat district

District	None	Stable/Electricity grid	Solar/wind/dam	Gas fuel	Liquid fuel	Coal/charcoal	Wood/sawdust/grass
Berea	6	1	0	0	21	0	72
Botha-Bothe	4	3	0	0	18	2	73
Leribe	5	4	0	2	43	2	46
Mafeteng	3	3	0	1	42	1	50
Maseru	4	1	0	3	39	2	50
Mohale's Hoek	3	0	1	0	36	0	60
Mokhotlong	0	0	0	0	8	0	92
Qacha's Nek	3	0	0	0	18	3	78
Quthing	5	2	2	2	18	2	70
Thaba-Tseka	2	0	0	0	8	0	90
Overall	4	2	0	1	32	1	59

Across the country, the main source of fuel for both cooking and sources of heat is natural material (wood, sawdust, grass, etc.). Very few households use electricity for cooking (7%) or for heat (2%).

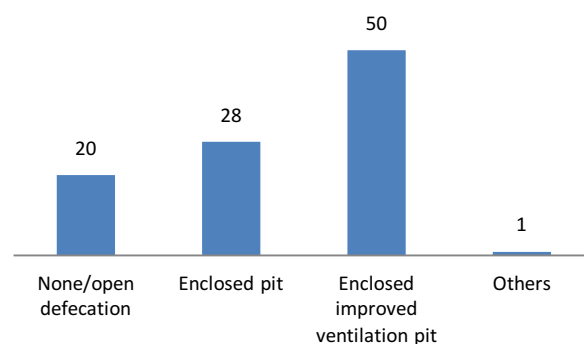
4% of households indicated that they do not use any fuel for heat⁴.

Housing conditions – Toilet facilities

The most common facility was an enclosed improved-ventilation pit (50%). We recorded 20% of households that did not have a toilet and practiced open defecation. Leribe is the district that had the most proportion of households using an enclosed flush (3%). After asking about their facilities, MPAT enumerators are expected to ask if they can observe the facilities in person. Respondents were also asked whether they shared their facility with other households (this question did not concern households who indicated that they had no facility). Overall, 20% of respondents indicated that

they did share their facilities, 6% of which shared their facility with two or more other households. In Maseru, 34% of households interviewed indicated that they shared their toilet facilities, whilst in Quthing, this figure dropped to 8%.

74 % of respondents indicated that their facilities had always been usable in the past year and 9% of households indicated that their households were never or rarely usable in the last year.

**Figure 14: Household's toilet facilities**

⁴ These households were spread across all districts.

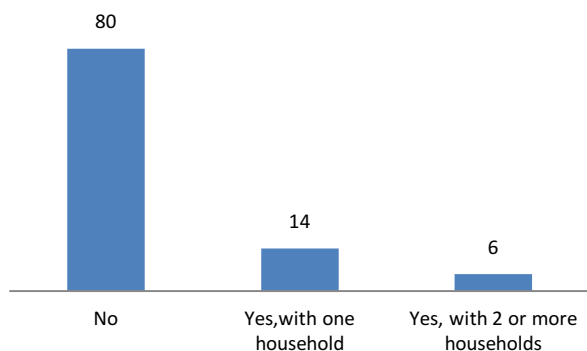


Figure 15: Sharing of toilet facilities

Housing conditions – waste

MPAT enquires what the household normally does with non-edible food waste, non-food waste, and wastewater. Most households fed non-edible food waste to their livestock (38%) or discarded it close to the house (36%). Non-food waste is usually burnt (54%) or discarded close to the household (41%). Wastewater is also generally discarded close to the household (85%).

Table 16: Means of discarding waste

	Non-edible food waste (%)	Non-food waste (%)	Waste water
Feed to pet/guard dogs	22		
Feed to livestock	38		
Compost it	3	2	
Discard close to a house (<75m)	36	41	85
Discard far from a house (>75m)	2	2	6
Burn it		54	
Use to water vegetable garden			7
Put down the drain (piped sewage network)			1
Discarded in local waterway or irrigation canal			1

Housing conditions

The most common material used for household walls is cement blocks, and the most common material for roofs is metal sheeting.

Less than a fifth of the sample believe that their household can withstand severe weather conditions. Across the country, around a third of households have stable electricity from a grid as their main source of energy for light. The main source of fuel for both cooking and sources of heat is natural material (wood, sawdust, grass, etc.).

The most common toilet facility is an enclosed improved-ventilation pit and a fifth of the sample practiced open defecation.

Waste management across the country is poor, characterised by low access to piped sewage networks and garbage collections.

Respondents were asked basic questions on sanitation, including frequency of teeth brushing, and hand washing. The results indicate that 46% of households brush their teeth 2-3 times a day, and 37% of households indicated that their members (including children) brush their teeth once a day. 5% of households in Thaba-Tseka indicated that they never brush their teeth. The question on the frequency of teeth brushing includes all methods (tooth brush, tooth paste, traditional means, etc).

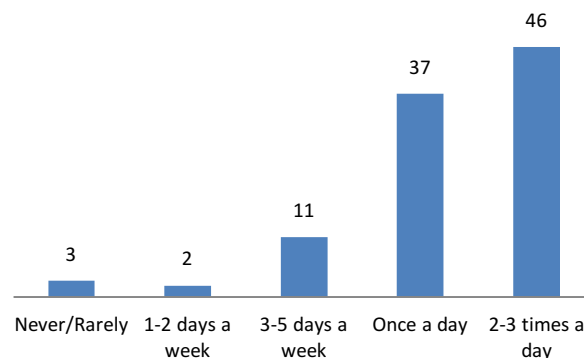


Figure 16: Frequency of teeth cleaning

In the MPAT analysis, we checked whether the access of water was a determinant factor in the frequency of cleaning teeth. Table 25 below shows that 83% of households with sufficient water all year round, cleaned their teeth once a day. 54% of households with sufficient water for only 6 months or less in a year brushed their teeth once a day.

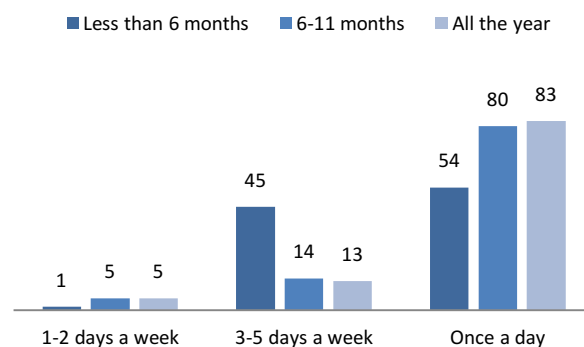


Figure 17: Link between access to water & teeth cleaning

Respondents were then asked how often the adults in the household clean their hands before eating a meal, and how often they clean their hands after defecating. 80% of households indicated that they always clean their hands before eating a meal, and 81% indicated that they always clean their hands after defecating.

The use of soap varies far more. 63% of respondents indicated that they use soap (any kind) both before meals and after defecating. 20% said that they use soap, but very rarely, and 9% indicated that they

never use soap. 4% use soap only after defecating and 3% use soap only before eating meals.

Sources of water

The main source of drinking and cooking water appears to be quite varied across and within agro-ecological zones in Lesotho. The only agro-ecological zone with little variety amongst sources is the Senqu River Valley which indicated that piped water from a water treatment plant (not chlorinated) was the main source both in the rainy season (85%) and in the dry season (81%). When taking an overall average across the country, protected springs are the most common main sources of water both in the rainy season (25% of households) and in the dry season (24%). The second most common source during the rainy season is piped water from a treatment plant (20%) and from an unprotected spring (23%) in the dry season.

72% of households indicated that their main source of water was the same in the rainy season and in the dry season.

MPAT enquires how long it takes for a household to collect water. The way in which this is calculated is by adding the time taken each way, and multiplying it by the number of people carrying water. Those that obtained water from taps were asked to enter '1 minute' as their answer.

In the rainy season, 77% of households require less than 30 minutes to collect water. In general, it takes households in the mountain areas and the foothills more time to collect water. The average time recorded to fetch water in the rainy season is of 17 minutes. The highest recorded time was 360 minutes.

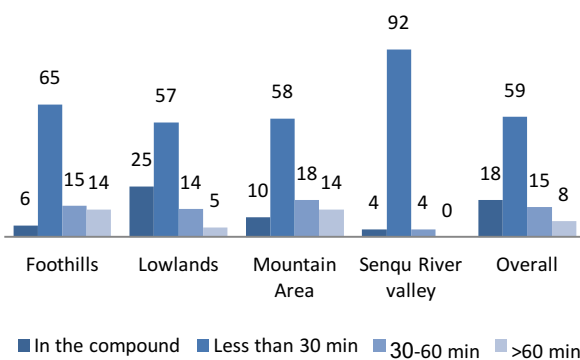


Figure 18: Average time to collect enough water for the day in rainy season

In the dry season, 56% of households require less than 30 minutes to collect water (as opposed to 77% in the rainy season). There is also a 5% drop in the number of households that can collect water from within the compound between the rainy season and the dry

season. As with the rainy season, it takes households in the mountain areas and the foothills more time to collect water. The average time recorded to fetch water in the dry season is of 31 minutes. The highest recorded time was 240 minutes.

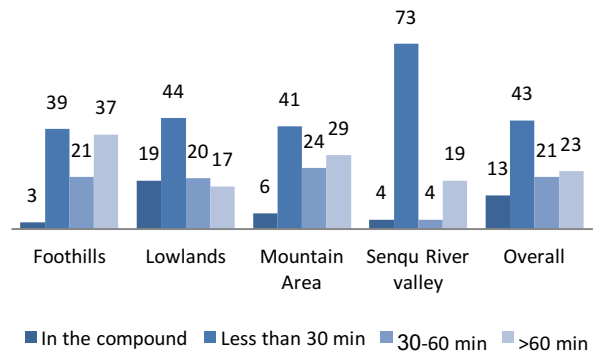


Figure 19: Average time to collect enough water for the day in dry season

The MPAT questionnaire then goes on to ask respondents for how many months out of the last 12 was the main source of water providing sufficient water for the household. The question does not specify if this is the main source overall, or the main source in each season.

Table 29 shows the results of this question for all ten districts, coupled with how often the household worried about shortages of water. Thaba-Tseka, a mountainous area, is the district in which the least amount of households (53%) claimed to have sufficient water all year round. Quthing, in the Senqu River valley, is the district with the highest percentage of households claiming to have sufficient water all year round (85%). These results are generally consistent with how often people worry about the main source not providing enough water. Indeed, of the respondents who indicated that their main source was sufficient throughout the last year, 69% said they never or rarely worried about shortages.

Table 17: Main two sources of water per district, in each season: rainy, dry, and most of the year

District	Rainy season	Frequency	Dry season	Frequency	Most of the year	Frequency
Berea	piped from water treatment plant (chlorinated)	29	Protected box spring	28	Protected box spring	36
	Protected box spring	29	piped from water treatment plant (chlorinated)	23	piped from water treatment plant (chlorinated)	25
Botha-Bothe	Protected box spring	25	Unprotected spring	30	Protected box spring	31
	piped from water treatment plant (not chlorinated)	18	Protected box spring	25	Unprotected spring	26
Leribe	piped from water treatment plant (not chlorinated)	21	Unprotected spring	22	piped from water treatment plant (not chlorinated)	21
	piped from water treatment plant (chlorinated)	20	Protected box spring	21	Borehole(>20m)	20
Mafeteng	Protected box spring	28	Borehole(<20m)	26	piped from water treatment plant (not chlorinated)	28
	Borehole(<20m)	27	Protected box spring	20	Protected box spring	26
Maseru	piped from water treatment plant (not chlorinated)	36	Protected box spring	36	Borehole(<20m)	39
	Protected box spring	31	piped from water treatment plant (not chlorinated)	34	Protected box spring	22
Mohale's Hoek	piped from water treatment plant (chlorinated)	27	Unprotected spring	42	Borehole(<20m)	54
	Borehole(<20m)	23	piped from water treatment plant (chlorinated)	26	Borehole(>20m)	15
Mokhotlong	piped from water treatment plant (chlorinated)	38	Protected box spring	32	piped from water treatment plant (chlorinated)	33
	Protected box spring	23	piped from water treatment plant (chlorinated)	27	Borehole(<20m)	19
Qacha's Nek	piped from water treatment plant (chlorinated)	43	piped from water treatment plant (chlorinated)	43	Protected box spring	38
	Unprotected spring	40	Unprotected spring	30	Unprotected spring	15
Quthing	Protected box spring	48	Protected box spring	45	piped from water treatment plant (chlorinated)	65
	piped from water treatment plant (chlorinated)	40	piped from water treatment plant (chlorinated)	25	Protected box spring	24
Thaba-Tseka	Protected box spring	47	Unprotected spring	48	Protected box spring	83
	Unprotected spring	35	Protected box spring	32	Unprotected spring	8
Overall	Protected box spring	25	Protected box spring	24	Protected box spring	23
	piped from water treatment plant (chlorinated)	20	Unprotected spring	23	piped from water treatment plant (chlorinated)	18

Table 18: Number of months in the last year that the household had sufficient water, coupled with anxiety about shortages, per district

District	Less than 6 months	6-11 months	All year	Never/Rarely	Sometimes	Often/Always
Berea	2	26	72	57	25	18
Botha-Bothe	3	19	77	62	27	11
Leribe	13	28	58	52	21	27
Mafeteng	4	16	80	64	22	14
Maseru	1	22	77	66	21	14
Mohale's Hoek	0	15	85	57	33	10
Mokhotlong	8	32	59	77	13	10
Qacha's Nek	0	21	79	43	30	28
Quthing	0	5	95	63	25	12
Thaba-Tseka	2	45	53	35	43	22
Overall	5	23	72	58	24	17

Respondents are asked whether they treat the drinking and cooking water, regardless of its source. Any means of treatment is considered (from boiling, to filtering, to chemicals, etc). When looking at the sample overall, 63% of households never or rarely treat the water and only 1% believes that water is below satisfactory. Table 31 below shows perceptions of water quality per district as well as frequency of treatment which demonstrates a general but weak

association between treatment and water quality perception. Out of the households that perceived water to be of very poor or bad quality (162), only 18% always or often treated it.

When comparing agro zones, a greater proportion of households in the Senqu River Valley indicated that they perceived the water quality to be very good (62%).

Table 19: Perception of water quality and treatment per district

District	Very bad/Poor	Satisfactory	Good/Very good	Don't know	Not necessary	Never/Rarely	Sometimes	Often/Always
Berea	1	13	59	27	18	66	10	6
Botha-Bothe	1	10	66	23	15	70	8	7
Leribe	1	18	61	20	21	60	9	10
Mafeteng	1	3	66	30	15	71	9	6
Maseru	1	10	58	31	16	71	9	4
Mohale's Hoek	0	9	66	25	15	74	5	5
Mokhotlong	8	8	71	12	20	57	13	10
Qacha's Nek	0	20	56	25	10	71	10	11
Quthing	0	7	72	22	20	70	7	3
Thaba-Tseka	2	18	64	17	10	67	12	11
Overall	1	11	63	24	17	67	9	8

Water and Sanitation

Households across the country appear to have good hygiene practices, with frequent teeth brushing and use of soap.

When taking the average across the country, the most common main source of water to meet drinking and cooking needs is a protected spring. The majority (72%) of households indicate that they have enough water all year round to meet their drinking and cooking needs.

sampling, the distance to nearby urban areas was not taken into account. 79% of those with access to agricultural land indicated that all of it was used by the household. 16% of households indicated that they leased a part of it and 5% leased all of the agricultural land. The average amount of land that a household owns is 4.92 acres, and the maximum recorded size is 20 acres.

The size of landholdings is greatest in the lowlands. The type of ownership is more or less homogenous across the country with households either owning their land through a freehold agreement (45%) or through common law ownership (48%). While there is very little difference between male and female headed households, no female households rented land for less than 12 months, whereas 2% of male headed households indicated that they were doing so.

Farming – land ownership

On average, 59% of the households interviewed had access to agricultural land. While Table 20 indicates that households in some districts have more access to land than others, it is important to note that when

Table 21 below shows the differences in land ownership across districts. We see that the ratio of households share-cropping is greater in Quthing and in Botha Bothe, and that Mokhotlong is the district with the greatest proportion of households that lease

their land. The MPAT allows for more detailed analysis on the leasing of land, where respondents can indicate whether they have leased it for less than 5 years, between 5 and 10 years, 20 and 30 years, and so on. Given that so few respondents in Lesotho

indicated that they leased their land, we grouped these responses into one category.

Table 20: Land access and average size per district and per head of household gender

District	Access to land	Mean acreage	Less than 1 acre	1 to 2 acres	2 to 5 acres	More than 5 acres
Berea	71	5	4	10	38	47
Botha-Bothe	58	4	13	11	33	43
Leribe	50	5	13	19	29	39
Mafeteng	61	6	5	11	34	50
Maseru	59	5	9	22	27	42
Mohale's Hoek	58	4	9	2	58	30
Mokhotlong	75	6	13	5	36	46
Qacha's Nek	40	5	21	21	29	29
Quthing	75	5	12	2	48	38
Thaba-Tseka	63	5	12	0	44	44
Female headed	56	5	6	8	38	48
Male headed	61	5	11	14	35	40
Overall	59	5	9	12	36	43

Table 21: Type of land ownership

District	Illegal access	Share cropping	Rented less than 12 months	Common law ownership	Leasehold	Freehold(legally owned)	Other
Berea	0	1	2	58	0	39	0
Botha-Bothe	1	6	0	51	0	42	0
Leribe	0	1	3	44	4	49	1
Mafeteng	0	3	1	47	0	50	0
Maseru	0	2	1	45	0	51	0
Mohale's Hoek	0	2	2	48	3	45	0
Mokhotlong	2	2	2	40	9	38	7
Qacha's Nek	0	0	0	63	0	38	0
Quthing	0	7	2	56	0	36	0
Thaba-Tseka	0	0	0	53	3	45	0
Female headed	0	2	0	46	2	43	0
Male headed	0	2	2	50	2	50	1
Overall	0	2	2	48	2	45	1

including land with orchards, grass and trees (and not necessarily cropland).

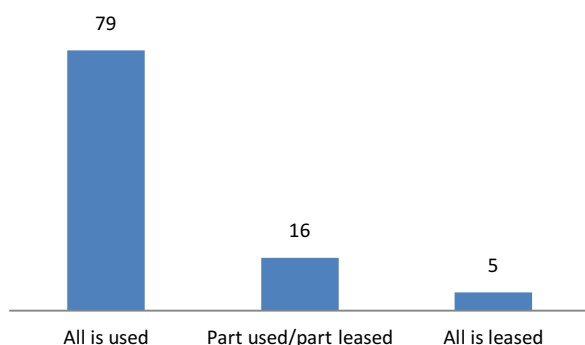


Figure 20: Household's land use

Respondents were asked whether the majority of their land was flat, gently sloped, or steep (or a mixture of these). Half of the recorded land was said to be flat, and only 3 households out of the 775 households with access to agricultural land indicated that their land was mixed – between slope-covered and flat. This comes as a surprise given Lesotho's mountainous land cover, but can be explained by the fact that households with agricultural land tend to have it placed in small areas that are flat, and surrounded by undulating land. It is also important to note that the MPAT question specified agricultural land broadly,

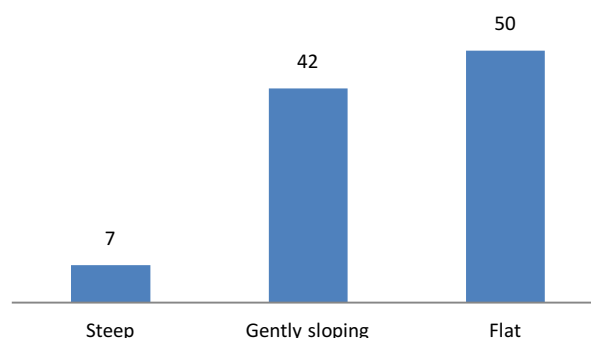


Figure 21: Type of agricultural land

All households with land were read a list of measures or practices of which some pertained to soil conservation, erosion control, and climate smart agricultural practices (Table 41). Thaba-Tseka is the district with the greatest proportion of households practicing land conservation techniques (68%). The district with the least practice is Leribe. The most common practice is terracing, followed by reduced ploughing.

Households with sloping or steep land were asked if their land was terraced. 48% of households did not do any terracing, 16% terraced part of the land, and 28% fully terraced their land. The households living in mountainous zones are less willing to terrace their land (61%). The majority of households (63%) responded that their land is of the loamy type (mixed clay, sand, and/or silt) with sandy-droughty land being the second most common form.

The type of soil may have strong links with agricultural productivity. While the MPAT data on its own is not sufficient to make any assumptions, collaboration with the World Agroforestry Centre, and the Land Degradation Surveillance Framework could produce interesting insights into this. “Beyond the Static: Earth Observation Assisted Assessment and Monitoring of Ecosystem Health and Resilience in IFAD Project Areas” is a project led by the World Agroforestry Centre (ICRAF) and funded by the International Fund for Agricultural Development (IFAD). The project addresses the need for improved baseline assessments to strengthen results-based management

on the ground, through the application of readily measurable and scientifically rigorous indicators to assess “ecosystem health” in landscapes.

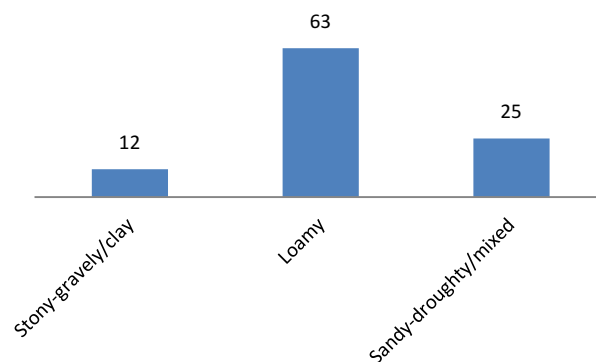


Figure 22: Soil type

Annex 1 provides some of the results from the Land Degradation Surveillance Framework and an introduction to the dashboard that combines the MPAT socioeconomic data and the biophysical data.

Table 22: Practice of terracing across districts

District	Not terraced	Less than half terraced	More than half terraced	Fully terraced
Berea	55	14	6	24
Botha-Bothe	38	19	13	30
Leribe	41	12	12	36
Mafeteng	49	28	8	15
Maseru	32	39	0	29
Mohale's Hoek	36	16	12	36
Mokhotlong	74	0	0	26
Qacha's Nek	54	8	0	38
Quthing	36	12	20	32
Thaba-Tseka	73	0	4	23
Overall	48	16	8	28

Table 23: Conservation techniques across districts

District	Agroforestry/Planting trees	Reducing erosion by wind and water	Terracing and/or land reclamation	Reduced ploughing	Mulching to retain soil moisture and regulate soil temperature
Berea	2	13	20	15	4
Botha-Bothe	2	10	40	11	5
Leribe	0	12	16	12	6
Mafeteng	0	9	23	15	5
Maseru	0	5	27	20	9
Mohale's Hoek	2	9	36	9	6
Mokhotlong	0	21	18	13	15
Qacha's Nek	0	7	43	14	0
Quthing	0	7	43	17	0
Thaba-Tseka	0	15	29	24	0
Female headed	1	9	28	14	4
Male headed	0	11	24	15	6
Overall	1	10	26	15	5

Overall, 50% of the respondents said that they are rotating crops between seasons for the soil. Mokhotlong is the district in which respondents use the least manure (3%). Male headed households are more willing to dose fertilizer (32%) than female headed households (22%). In the Senqu river valley,

46% practiced intercropping with nitrogen fixing legumes.

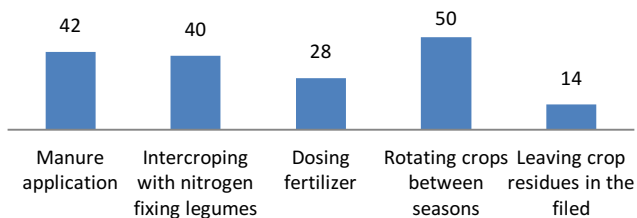


Figure 23: Farming practices

Farming – Inputs

Respondents with land were asked whether they were able to make, buy or acquire enough compost/manure or artificial fertilizer in the last two years before this survey. The same question was then asked in reference to seeds.

Figure 24 indicates that acquiring sufficient seed was not a problem for 51% of households, because they either had seeds from a previous season (29%) or were able to acquire enough by any means (22%). Acquiring enough compost/manure appears to be of concern to more households, however, with 36% claiming to never or rarely have enough. Of the households that could never or rarely acquire enough compost or fertilizer, 53% could also not acquire enough seed. Of the households that could never afford seed, 79% were not able to acquire enough compost or fertilizer either.

For those households with livestock, respondents were asked whether they were able to grow, collect, or buy enough fodder in the last 2 years. 41% of respondents indicated that they could never acquire enough fodder, compared to 7% who rarely had enough, 22% who sometimes had enough, 17% who often had enough, and only 13% indicated that they always had enough fodder.

In terms of labour, 20% of households indicated that they never had enough labour, and 34% responded that they always had enough labour.

When looking at differences between male headed and female headed households, it appears that the results are the same in terms of labour. Male headed households are far more likely to have had enough seed in the last two years (26% as opposed to 15%). Female households however, have more seed saved from previous years (33% as opposed to 26%).

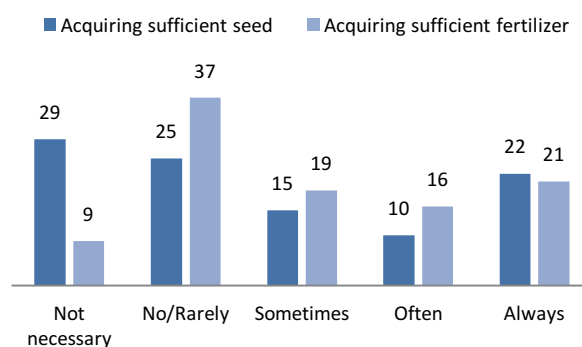


Figure 24: Capacity of households to acquire seeds/fertilizers

Farming – Water

Respondents were asked if they felt that they generally had enough water for their household's crops during the dry season and during the rest of the year respectively. On average, 44% of households indicated that they never or rarely had enough water for their crops in the dry season. The district with the most households responding that they didn't have enough water was Mokhotlong, a mountainous area. The district with the most households indicating that they had sufficient water is Maseru (37% of households responded that they often or always had enough water).

Table 24: Water availability for crops during the dry season per district and household head gender

District	Never	Rarely	Sometimes	Often	Always	Few/no crops grown
Berea	26	20	29	14	11	0
Botha-Bothe	38	10	30	16	6	0
Leribe	28	19	30	10	12	1
Mafeteng	25	26	26	14	8	3
Maseru	19	16	28	28	9	0
Mohale's Hoek	19	9	49	17	6	0
Mokhotlong	44	13	26	8	10	0
Qacha's Nek	21	0	50	14	14	0
Quthing	14	29	31	19	7	0
Thaba-Tseka	29	15	35	12	9	0
Female headed	26	19	32	16	7	0
Male headed	27	18	30	14	11	1
Overall	26	18	31	15	9	1

Table 25: Water availability for crops during the rest of the year

District	Never	Rarely	Sometimes	Often	Always	Few/no crops grown
Berea	8	11	41	26	14	0
Botha-Bothe	5	2	63	8	21	2
Leribe	11	12	47	19	12	0
Mafeteng	4	6	48	29	12	1
Maseru	4	2	42	30	22	0
Mohale's Hoek	4	0	55	28	13	0
Mokhotlong	15	18	44	13	10	0
Qacha's Nek	0	0	57	14	29	0
Quthing	0	5	48	36	12	0
Thaba-Tseka	0	15	38	32	15	0
Female headed	5	8	49	26	12	0
Male headed	7	7	46	23	16	1
Overall	6	7	48	24	15	0

The same question about water scarcity was asked for livestock. On average, 53% of households indicated that they always or often had sufficient water during the dry season. The district with the largest proportion of households indicating that they never or rarely had sufficient water was Botha Bothe. Just like

with crops, Maseru was the district with the highest proportion of households that often or always had sufficient water for livestock. On average, 48% of households never or rarely had enough fodder to feed their livestock. Female headed households are more likely to never or rarely have enough fodder.

Table 26: Livestock ownership and availability of water/fodder per district

District	% of households with livestock	Dry season					Rest of the year					Enough fodder				
		Never	Rarely	Sometimes	Often	Always	Never	Rarely	Sometimes	Often	Always	Never	Rarely	Sometimes	Often	Always
		Berea	59	16	10	28	26	20	5	6	30	31	28	43	9	15
Botha-Bothe	51	30	8	18	18	26	3	5	36	18	38	38	5	26	16	15
Leribe	53	7	12	23	32	26	3	12	23	34	29	41	8	30	14	8
Mafeteng	64	13	18	20	20	29	4	2	35	23	36	38	5	23	15	18
Maseru	56	11	5	24	22	38	1	0	24	27	48	34	3	23	20	20
Mohale's Hoek	64	16	13	19	17	36	0	3	36	22	39	44	6	19	22	9
Mokhotlong	62	14	3	24	32	27	3	0	24	38	35	49	8	19	16	8
Qacha's Nek	60	21	4	0	38	38	0	13	13	17	58	54	4	8	21	13
Quthing	78	13	11	26	23	28	4	2	23	32	38	51	13	11	13	13
Thaba-Tseka	68	10	12	20	39	20	2	5	15	41	37	41	5	20	20	15
Female headed	47	15	10	21	22	31	2	7	27	26	38	50	4	22	14	11
Male headed	68	12	12	22	27	27	3	5	28	29	35	37	8	22	18	15
Overall	59	13	12	22	25	28	3	5	28	28	36	41	7	22	17	13

Aquaculture

Out of the 1320 households interviewed, only 2 households (one in Leribe, the other in Maseru) indicated that they engaged in fish farming (aquaculture). One household indicated that it never had enough water during the dry season but sometimes had enough during the rest of the year. The other indicated that it never had enough water all year round. Both households responded that they never could make or buy enough fish feed.

A list of problems was put to respondents of households that had access to agricultural land, and they could indicate which of these they facing. The

top three problems overall are drought, pest infestations, and hail. Heat waves, soil erosion, and frost are also some of the most common problems. Although soil erosion is a major issue in the country, only 32% of respondents listed it as a problem that they were facing with their land.

Table 27: Agricultural challenges faced by households engaged in farming per district.

	Berea	Botha-Bothe	Leribe	Mafeteng	Maseru	Mohale's Hoek	Mokhotlong	Qacha's Nek	Quthing	Thaba-Tseka	Overall
Drought	87	94	85	96	94	94	92	86	90	94	91
Soil erosion	36	37	32	24	12	32	64	43	40	38	32
Floods	16	25	15	10	6	13	51	14	7	12	15
Landslides	5	14	6	1	0	2	23	0	5	6	5
Wild fires	3	3	3	1	0	0	0	0	0	0	2
Pest infestations	65	54	57	64	62	66	74	64	67	62	62
Frost	32	43	32	18	23	32	67	71	33	62	33
Hail	41	44	37	39	35	42	62	57	36	12	39
Heavy rains	31	30	28	22	20	30	31	7	21	21	26
Heavy winds	19	37	26	39	36	28	28	14	21	18	29
Soil salinity	0	13	7	7	4	6	13	0	2	3	6
Loss of soil fertility	9	19	10	12	7	6	15	14	5	6	10
Storms/strong winds	20	35	17	23	27	19	18	7	12	6	21
Plant diseases	11	24	12	21	15	17	31	7	12	24	17
None	0	0	2	0	0	0	0	0	0	0	0
Other	1	0	1	3	1	0	3	0	0	0	1
Don't know	0	2	0	1	0	0	0	0	0	0	0

Farming

The majority of households own their land through common law ownership.

Households were very unlikely to practice measures pertaining to soil conservation, erosion control, and climate smart agricultural practices. Terracing was the most common practice, but still only a fifth of households practiced this. Less than 15% of households practiced mulching, agroforestry, or reduced ploughing.

Less than half of the households practice intercropping, leave crop residues in the field, use manure, or dose fertilizers on their land.

Only a fifth of households are able to make or acquire sufficient seeds and fertilizer for their agricultural production every year.

Almost half of the households indicated that they never or rarely had enough water for their crops or livestock in the dry season.

Other livelihoods, credit and material well-being

The first two sections on respondent and household characteristics indicated that the most common occupations listed were farming and livestock keeping, followed by housewife and employee. In addition to questions pertaining to farming, respondents were asked about two other income sources: running a business and providing skilled services. Overall, 17% of respondents indicated that in the previous 12 months, they had managed or run their own business (other than selling agricultural products). The vast majority (77%) of respondents indicated that they had never provided a skilled service for money or barter in the previous 12 months. These figures do not vary greatly between districts, as shown by Table 28 below. Female headed households were less likely to have operated a business, but this is mainly explained by their higher average age.

Table 28: Household business and skilled services (%)

District	% of households that run a business	% of households that provide a skilled service			Often	Always
		Never	Rarely	Sometimes		
Berea	11	81	8	4	5	2
Botha-Bothe	10	82	7	7	4	1
Leribe	16	74	7	10	4	5
Mafeteng	19	73	6	10	2	8
Maseru	24	77	5	5	6	6
Mohale's Hoek	25	79	9	3	5	4
Mokhotlong	10	78	8	7	3	3
Qacha's Nek	18	73	8	10	5	5
Quthing	20	82	7	7	3	2
Thaba-Tseka	13	80	7	5	3	5
Female headed	15	80	7	7	3	3
Male headed	18	74	7	7	5	6
Overall	17	77	7	7	4	5

households were more likely to have debts than male headed households.

Credit

Most respondents indicated that the household would not be able to borrow money from a bank or other financial service provider (excluding relatives or friends) if they wanted to (77%). Although the proportion is still low, Quthing was the district in which most respondents indicated that they could definitely acquire a loan (20%). Female headed households were less likely to believe that they could get a loan. This difference is partly explained by the higher average age of female household heads in the database, as households with older heads were more likely to say they would not get a loan. The gender effect, however, is no longer significant once age is controlled for.

52% of households had debts (with relatives or friends). While figures were not asked, respondents were asked whether they perceived it to be a little amount, a moderate amount, or a lot. Out of the 52%, 24% of households considered the sum to be a little, while 14% considered it to be a lot. Female headed

Most household borrowing was from friends (42%) followed by a village fund. 15% selected the answer option 'other' when asked about the source of credit, and this generally referred to the village shop. Male headed households were more likely to have loans with private banks than female headed households. Conversely, female headed households were more likely to have loans with village funds than male headed households.

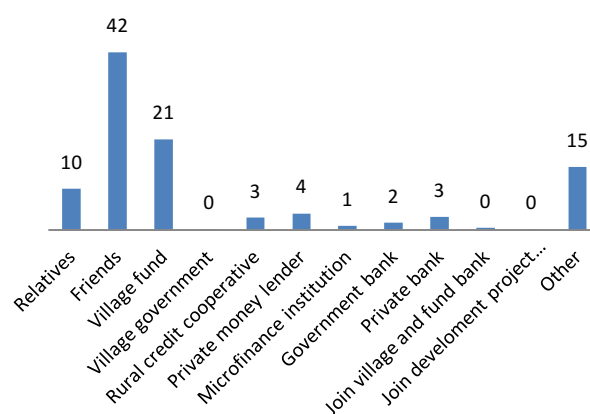


Figure 25: Source of credit

Table 29: Perceived ability to get a loan (%) across districts

District	No	Probably not	Probably yes	Definitely yes	Don't know
Berea	83	1	3	7	6
Botha-Bothe	80	1	2	15	3
Leribe	73	2	6	16	4
Mafeteng	74	4	6	12	3
Maseru	81	1	5	11	1
Mohale's Hoek	83	1	3	8	5
Mokhotlong	85	0	2	8	5
Qacha's Nek	90	0	3	8	0
Quthing	62	3	8	20	7
Thaba-Tseka	72	2	8	13	5
Female headed	84	1	3	8	4
Male headed	72	2	6	16	3
Overall	77	2	5	13	4

Table 30: Household indebtedness

District	No	Yes, a little	Yes, a moderate amount	Yes, a lot	Don't know
Berea	50	22	11	15	2
Botha-Bothe	53	21	13	9	3
Leribe	50	25	10	13	1
Mafeteng	44	22	18	13	3
Maseru	45	21	21	9	3
Mohale's Hoek	49	22	12	16	1
Mokhotlong	42	30	13	15	0
Qacha's Nek	40	30	13	15	3
Quthing	38	15	20	25	2
Thaba-Tseka	38	37	10	15	0
Female headed	45	25	15	14	1
Male headed	48	23	13	14	3
Overall	47	24	14	14	2

Material well being

As a proxy for the material well-being of the household, the MPAT questionnaire includes three questions about adequate footwear, sufficient clothing for extreme weather (hot and/or cold), and ownership of a television. Overall, 73% of respondents said that all the members of a household had adequate footwear, and 68% indicated that all members had sufficient clothing. The households in Mokhotlong appeared to fare worst – the proportion of households with all members living without adequate footwear (10%) and insufficient clothing (18%) is significantly higher than the other districts. There is little variation between male headed and female headed households. Television ownership differs slightly per district, with Thaba-Tseka being the district in which the least households own a TV (15% have 1 TV), and Leribe being the district in which most households have a TV (47%). Having two or more TVs was very rare, and male headed households were more likely to own at least one TV than female headed households.

MPAT asks respondents whether they believe that there are households in their area with fewer economic or political opportunities than others because of their religion or ethnicity/minority group. When asked about equality in the area, the majority overall (57%) said that these inequalities did not exist. The question asks how many of the households in the area have fewer opportunities, and out of the 39% of the respondents that said that these inequalities existed, only 9% indicated that more than half the households experienced these inequalities. Botha-Bothe is the district in which most households reported that there were no inequalities (67%).

Respondents who indicated that inequalities did exist were also asked how this situation had evolved in the previous two years. The most common view is that there had been no significant change (34%), while 27% perceived the situation to have improved, and 25% perceived the situation to have worsened. In Mafeteng, the majority of respondents indicated that the situation had improved (38%). 54% in Mokhotlong, however, perceived the situation to have worsened.

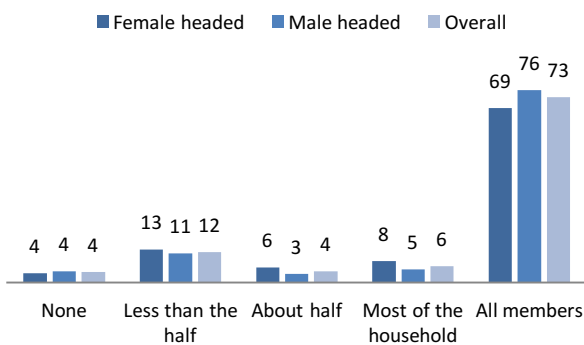


Figure 26: Ownership of adequate footwear

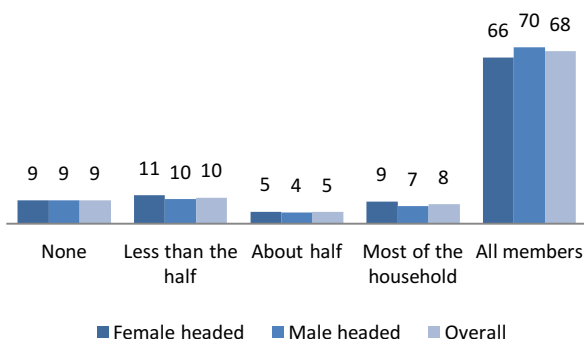


Figure 27: Ownership of adequate clothing

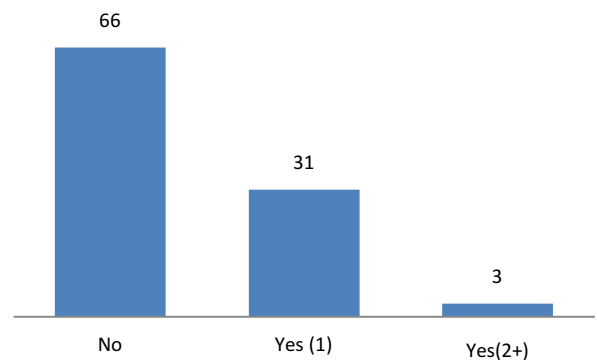


Figure 28: Ownership of television

Table 31: Existence of reduced economic or political opportunities for religious/ethnic/minority groups

District	No	Yes, few	Yes, less than half	Yes, about half	Yes, more than half	Don't know
Berea	51	21	7	8	10	3
Botha-Bothe	67	15	3	3	8	5
Leribe	61	20	6	2	6	5
Mafeteng	48	24	5	8	9	5
Maseru	57	23	1	5	8	6
Mohale's Hoek	57	17	2	6	10	8
Mokhotlong	53	17	3	8	17	2
Qacha's Nek	65	13	5	3	8	8
Quthing	58	15	7	3	7	10
Thaba-Tseka	55	22	10	2	12	0
Female headed	56	22	5	4	8	5
Male headed	57	19	5	5	9	5
Overall	57	20	5	5	9	5

Other livelihoods, credit, and material wellbeing

Less than a fifth of households had managed or run their own business (other than selling agricultural products) and the vast majority indicated that they had never provided a skilled service for money or barter in the last year.

Most respondents perceive that they are unable to borrow money from a bank or other financial service provider (77%).

More than half of the households are indebted (mainly to friends or a village fund).

The majority of households have adequate clothing and footwear for all the members of the household.

More than half of the households do not own a television.

The three most common negative events that households are most concerned about across the country are strong winds and storms, drought, and heavy rains or hail. All districts mentioned strong winds/storms as the event that they are most worried about, except for Thaba-Tseka, where households are equally worried about drought and strong winds/storms. Only 1% of MPAT respondents said that they were not worried about any negative events, and 4% could not mention any. The results for female headed households are similar to male headed households, although they are slightly less worried about drought, and more worried about strong winds and storms which are damaging to the infrastructure of the household.

When comparing the results per agro zone rather than per district, we notice that unlike the other agro zones, the Senqu River Valley is more concerned about thieves and robbery than heavy rains or hail.

MPAT also asks how damaging the mentioned event would be if it occurred, and how likely it was to happen. The vast majority of households indicated that the main negative event would have a major impact on their households (95%) and that it was very likely to occur (62%). The pattern is very similar across all districts. Male headed households appear to be slightly more optimistic about the severity of the events, with a higher percentage indicating that the impact will be medium-moderate rather than severe.

Negative events

The MPAT questionnaire also includes a section about negative events, their severity, likelihood, and the household's ability to deal with them. In an open question respondents were first asked to mention up to three natural or social negative events that they worried would have a bad impact on the household in the following 12 months. Table 32 below shows only the first problem (the one most worried about) that respondents listed.

Table 32: Negative events that households are worried about per district and per head of household gender

Negative event	Berea	Botha-Bothe	Leribe	Mafeteng	Maseru	Mohale's Hoek	Mokhotlong	Qacha's Nek	Quthing	Thaba-Tseka	Female headed	Male headed	Overall
Drought/Lack of water	19	25	21	27	39	28	13	25	15	32	22	26	25
Animal disease or death	1	0	1	0	0	0	0	0	3	2	1	1	1
Heavy rains/hail	12	14	11	7	10	12	18	18	13	20	11	12	11
Job loss	5	3	2	6	1	5	0	5	8	0	3	4	4
Strong winds/storms	43	43	31	49	46	40	27	40	57	32	45	38	41
House breaking/thieves	8	6	11	6	2	11	13	10	2	8	8	8	8
Lack of/scarcity of	1	1	5	0	0	0	7	3	0	2	3	1	2

food														
Accidental death	1	0	2	0	1	0	0	0	0	2	1	1	1	
Serious illness	1	1	1	0	0	0	3	0	0	0	0	1	1	
Crop infestation	0	0	1	0	0	1	3	0	0	0	0	1	0	
Fire	3	0	4	0	0	0	3	0	0	2	1	2	2	
Infrastructure damage	1	2	0	1	0	0	0	0	0	0	0	1	0	
Not worried about any event	0	1	2	0	0	1	8	0	2	0	1	1	1	
Don't know	4	4	9	3	1	2	3	0	0	2	3	5	4	

Table 33: Negative events that households are worried about per agro zone

Negative event	Foothills	Lowlands	Mountain Area	Senqu River valley
Drought/Lack of water	30	26	17	27
Animal disease or death	0	1	1	0
Heavy rains/hail	10	7	25	4
Job loss	2	4	3	8
Strong winds/storms	40	45	30	38
House breaking/thieves	5	8	9	15
Lack/scarcity of food	3	1	4	0
Accidental death	0	1	1	0
Serious illness	2	0	1	0
Crop infestation	0	0	2	0
Fire	1	2	2	0
Infrastructure damage	0	0	1	0
Not worried	0	1	2	4
Don't know	6	4	3	4

13% of households indicated that they would be unable to recover from the negative event that they are most worried about (1st main event). 34% responded that it would take them 6 months or less to recover, and 29% responded that it would take between 6 months and a year to recover. Relatively more female headed households than male headed households responded that they would not be able to recover, and in the case when they could, the recovery period was expected to be longer.

Most respondents would rely on relatives for support (53%) should the negative event occur. After family, the most common answer for whom they would rely on was no one (18%). It is unclear whether this means that the respondents did not feel they needed anyone, or that they had no one to rely on. Female headed households were more likely to rely on family or on no one than on the government or friends like male headed households.

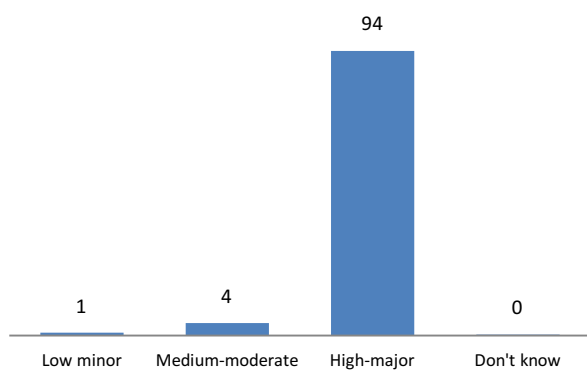


Figure 29: Severity of impact of a negative event

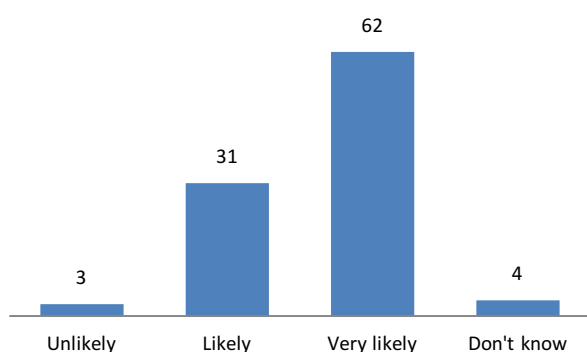


Figure 30: Likelihood of a negative event occurring

MPAT explores the households main reactions or coping mechanisms in response to the listed negative events.

Table 34: Source of assistance in case of the main negative event occurring

Source of Assistance	Berea	Botha-Bothe	Leribe	Mafeteng	Maseru	Mohale's Hoek	Mokhotlong	Qacha's Nek	Quthing	Thaba-Tseka	Female headed	Male headed	Overall
No one	18	18	19	19	21	13	7	18	20	20	20	16	18
Family/relatives	55	52	48	55	55	59	63	33	56	61	54	52	53
Friends	6	5	7	5	1	6	9	5	5	7	4	7	6
Insurance company	1	0	1	1	0	1	0	3	2	0	1	0	1
Financial institution	1	2	1	1	1	0	0	3	0	0	1	1	1
Local government	6	10	3	7	9	7	4	15	0	2	6	7	6
National government (general)	11	9	14	9	9	11	9	23	17	7	11	12	11
Aid organizations	0	1	1	0	1	0	0	0	0	0	1	1	1
Church/Mosque/Other religious group	1	0	0	2	1	1	4	0	0	0	1	0	1
Don't know	0	0	0	0	0	0	0	0	0	0	0	0	0
Others	2	1	1	0	0	0	0	0	0	2	0	1	0

The final question in this section of the questionnaire asked how long it would take the household to rebuild the house if an extreme disaster of any sort (not necessarily the initial negative events listed) had destroyed it completely. 25% of respondents indicated that they would not be able to rebuild the home at all or that they would have to move, while 40% indicated that it would take up to a year to do so. On average, the recovery period mentioned by households in response to this question is longer than the recovery period mentioned when they listed their own negative events. Similarly to the responses to the previous

question, we found that female headed households were more likely to not be able to rebuild the house: 31% of female-headed households said this compared to 21% of male-headed households.

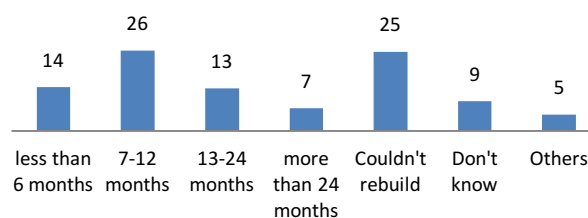


Figure 31: Average time to rebuild house after negative event

Table 35: Time to recover from main negative event (return to at least the situation before it happened)

District	less than 6 months	7-12 months	13-24 months	more than 24 months	Wouldn't recover	Don't know	Others
Berea	40	25	4	2	11	11	6
Botha-Bothe	33	32	4	0	12	12	7
Leribe	27	22	6	4	16	12	14
Mafeteng	39	29	4	1	15	9	3
Maseru	40	35	3	0	9	11	2
Mohale's Hoek	35	30	3	2	17	10	3
Mokhotlong	32	27	5	2	7	17	12
Qacha's Nek	35	35	3	3	15	8	3
Quthing	28	38	8	0	15	8	2
Thaba-Tseka	33	40	12	0	10	2	3
Female headed	29	31	4	1	16	12	6
Male headed	38	27	5	2	11	9	7
Overall	34	29	5	2	13	11	7

Negative events

Households are most concerned about strong winds and storms, drought, and heavy rains or hail. The vast majority of households indicated that these events would have a major impact on their households, with a third indicating that it would take 6 months or less to fully recover.

Most respondents rely on relatives for support should the negative event occur.

Food and Nutrition Security

This MPAT section aims to measure three elements of food and nutrition security: whether the household has sufficient quantities of food most of the time, the stability of the household's access to food, and the diet diversity.

Sufficiency of food

To establish the first of these elements, households were asked whether any household member skipped meals or ate smaller portions in the previous 12 months because the household did not have enough food, and whether any household member ever went to bed hungry. As shown in Table 36, the majority of households in all districts never had to forego food due to shortages, but there is a minority in Qacha's Nek (15%) that did have to skip meals or reduce

portions for more than one month in the last 12 months. 5% of households in Mokhotlong and in Berea indicated that they reduced meals and portions for most days of the year. Botha Bothe is the district in which most households (79%) never or only once or twice in the year had to reduce their meals and portions. There appears to be a significant difference between male and female headed households: 50% of male headed households never had to reduce consumption, while only 39% of female headed households said they never had to reduce consumption.

The answers to the next question about household members going to bed hungry in the last 12 months shows that this rarely happened (78% overall). In this case again there are slightly more female headed households that have to deal with their members going to bed hungry for about a week (4%).

Table 36: Household members skipping meals or reducing portions due to a lack of food (%)

District	Never	Once or twice	About 1 week	A few weeks	About 1 month	More than 1 month	Most days
Berea	38	29	10	7	5	5	5
Botha-Bothe	46	33	6	7	3	2	4
Leribe	51	22	7	6	4	6	4
Mafeteng	44	29	12	3	5	5	2
Maseru	49	39	5	1	0	5	1
Mohale's Hoek	40	25	13	5	8	6	3
Mokhotlong	43	23	5	8	7	8	5
Qacha's Nek	35	25	13	5	8	15	0
Quthing	50	18	15	7	2	7	2
Thaba-Tseka	45	32	5	7	7	5	0
Female headed	39	30	9	7	6	7	3
Male headed	50	26	8	4	3	5	3
Overall	46	28	9	5	4	6	3

Table 37: Household members going to bed hungry due to lack of food (%)

District	Never	Once or twice	About 1 week	A few weeks	About 1 month	More than 1 month	Most days
Berea	68	24	3	2	1	1	1
Botha-Bothe	77	15	5	2	2	0	0
Leribe	81	12	2	1	1	1	2
Mafeteng	79	16	3	1	0	1	0
Maseru	80	18	2	0	0	0	0
Mohale's Hoek	82	17	0	0	0	1	0
Mokhotlong	68	20	3	5	2	2	0
Qacha's Nek	73	15	3	5	0	5	0
Quthing	82	13	3	2	0	0	0
Thaba-Tseka	73	22	0	2	2	0	2
Female headed	74	17	4	1	1	1	1
Male headed	80	16	1	1	0	1	1
Overall	78	16	3	1	1	1	1

Stability of food access

This element was investigated with two questions: i.) whether in the last 12 months the household experienced a period longer than 2 weeks when there was insufficient food, and ii.) whether days had occurred without any food at all. Although it may be

difficult for some households to recall such periods in a large time frame, asking about the last 12 months allows for us to include seasons given that these may have a drastic effect food deficiency (dry season for example).

Around 63% of households have indicated that they did not experience a period of longer than 2 weeks in

which they had insufficient food. Leribe district appears slightly better off, with 70% of households indicating that they did not experience these periods of food deficiency. The results for female headed and male headed households differ slightly- 39% female headed households had experienced at least one of these periods in the last year, as opposed to 33% of male headed households.

Table 38: Frequency of the household experiencing periods of longer than two weeks without sufficient food (%)

District	No	1 period	2 periods	3 periods	4 periods	More than 4 periods	Don't remember
Berea	54	15	13	3	1	10	4
Botha-Bothe	68	16	6	6	3	3	0
Leribe	70	11	7	2	2	6	2
Mafeteng	63	18	10	2	3	4	0
Maseru	60	25	6	4	4	2	0
Mohale's Hoek	60	16	10	5	1	6	2
Mokhotlong	60	18	12	3	2	3	2
Qacha's Nek	50	20	18	0	5	5	3
Quthing	67	13	7	7	3	0	3
Thaba-Tseka	63	22	8	2	2	3	0
Female headed	60	19	10	3	2	5	2
Male headed	66	15	8	3	3	4	1
Overall	63	16	9	3	2	5	1

Table 39: Households going without food for one full day (%)

District	Never	Once or twice	Once a month	Every 2 weeks	Every week
Berea	76	19	2	1	1
Botha-Bothe	88	10	3	0	0
Leribe	83	11	3	2	1
Mafeteng	88	10	1	0	0
Maseru	91	9	1	0	0
Mohale's Hoek	88	12	0	0	0
Mokhotlong	65	20	12	3	0
Qacha's Nek	75	23	0	3	0
Quthing	88	10	0	2	0
Thaba-Tseka	82	17	2	0	0
Female headed	83	14	2	1	0
Male headed	85	11	2	1	0
Overall	84	12	2	1	0

Diet diversity

To appraise the diet diversity, households were asked how often food in seven different groups (grains; roots /tubers; vegetables; fruits; dairy and eggs; meat/fish/seafood; legumes/nuts) was consumed in the year before the survey. As shown by Figure 32 below, grains are eaten on a daily basis by the majority of households. The majority of households almost never or very infrequently eat meat, roots, and fruits. Almost no household never eats dairy or eggs, but only 5% indicate that they consume these products every day.

We calculated a single indicator for low diet diversity, which we defined as not eating three or more food groups at least once a week. This is similar to a metric by the World Food Programme⁵. It showed that 77%

Overall, 84% of households never went for a full day without food to eat in the last 12 months. Mokhotlong fared worst in this situation, with 35% of households going without food for a full day at least once in the last 12 months. In Maseru, however, 91% of households never experienced this situation.

of the households overall had low diet diversity in the year preceding the survey. Mafeteng was the district that fared best in terms of diet diversity, and Mokhotlong was the district that fared worst. Female headed households appear to have a lower diet diversity than male headed households, but this is explained by the higher average age of female household heads⁶.

⁵ WFP(2013) Comprehensive food security and vulnerability analysis, Tanzania, 2012. Available at <http://documentns.wfp.org/stellent/groups/public/documents/ena/wfp259829.pdf>

⁶ Once age and household size was controlled for in a logistic regression, the gender effect was no longer statistically different

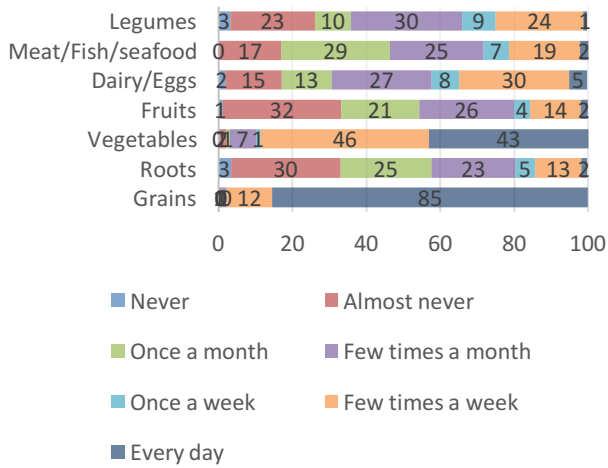


Figure 32: Frequency of consumption of the seven food groups

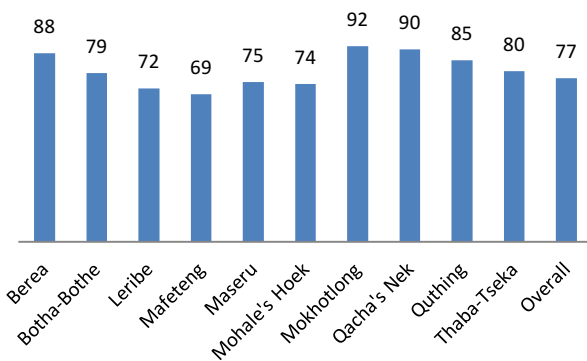


Figure 33: Households with low diet diversity (i.e. three or more food groups not eaten at least once a week)

Food and Nutrition Security

The majority of households in all the districts never had to forego food due to shortages. The likelihood of having to reduce consumption is greater amongst female headed households.

Households rarely had to go to bed hungry, and the majority of respondents indicated that they never went for a period of 2 weeks or longer without sufficient food or for a full day without food to eat.

The diet diversity and nutrition quality is recorded as low. Members of a household eat grains every day (pap) but almost never or very infrequently eat meat, roots, and fruits, and rarely consume dairy products or eggs on a daily basis.

Climate

Overall, 71% of respondents had heard of the term 'climate change'⁷. 81% of respondents were familiar with the term in Maseru, while only 55% were familiar with the term in Thaba-Tseka. Female headed households were slightly more unlikely to be aware of the term (68% as opposed to 71% for male headed households). Respondents were then asked how or where they had heard about climate change. A great majority had indicated radio (76%), followed by TV (33%), information exchange with fellow farmers (21%), and community groups (13%). Of the 1320 households, only one single respondent answered 'a development NGO' as a source of information regarding climate change.

When comparing results across agro zones, 75% of households in the lowlands had heard of climate change, compared with 58% in the Senqu River valley, 60% in the mountain area, and 68% in the foothills. Information exchange amongst farmers on climate change appears greatest in the foothills (23%) and lowest in the mountain area (19%). Radio remains the most common source across all agro zones.

Respondents were then asked whether they had observed changes in weather patterns since they were young⁸, regardless of whether or not they had heard of the term 'climate change'. Overall, 72% of respondents had observed changes. Respondents in the foothills and the mountain areas were more likely to have observed changes than respondents in the lowlands or the Senqu river valley.

Although 72% had observed these changes in weather patterns, 54% of respondents indicated that they had not changed their agricultural practices since they were young. The Senqu River Valley is the only agro zone in which the majority of respondents answered that they had indeed changed their agricultural practices (59%).

For those households that had changed their practices, Table 40 presents what these changes involved.

⁷ Particular attention was paid to the translation of the term 'climate change' to Sesotho, to avoid confusion given that we were interested in knowing whether the respondent had heard the term, not whether they knew what it was or not.

⁸ When a respondent was young (i.e. younger than 25 years old), enumerators were asked to make a note of this because we're interested in at least 15 years of recollection as an adult.

Table 40: Changes in the agricultural practices

District	Delay in planting	Using hybrid seeds	Reduction in crop production	Start crop rotation	Rely on irrigation	Increase the use of manure	Introduce conservation farming	Reduce number of livestock/use other feeds	Others
Berea	72	9	2	0	0	0	5	2	9
Botha-Bothe	73	9	0	0	3	0	6	3	6
Leribe	70	2	4	2	5	1	5	0	10
Mafeteng	77	3	0	0	0	1	3	0	15
Maseru	80	0	2	2	2	0	4	0	10
Mohale's Hoek	95	0	0	0	0	0	0	3	3
Mokhotlong	65	10	5	0	0	5	5	0	10
Qacha's Nek	82	0	0	18	0	0	0	0	0
Quthing	89	0	0	0	0	0	0	0	11
Thaba-Tseka	75	0	5	5	0	0	0	0	15
Female headed	77	4	1	2	1	1	3	1	9
Male headed	77	3	2	1	2	1	3	1	10
Overall	77	3	2	1	1	1	3	1	10

The majority of the respondents indicated that as a result of the changing weather patterns and delayed rainfall, they postponed the planting of their crops (77%). 95% of respondents in Mohale’s Hoek who had noticed a change in weather patterns indicated that this was their adaptive strategy. In Qacha’s Nek, however, farmers tended to adopt crop rotation practices instead (18%). Very few respondents indicated that they increased their use of manure or irrigation. 1% of the sample indicated that they reduced the number of their livestock.

that they had access to hydrology advisories⁹, 15% had access to temperature forecasts, and only 8% had access to extreme event advisories.

After asking about which types of weather information households received, respondents were then asked whether or not they actively used this information to make agricultural decisions. 82% of respondents that received rainfall forecasts said they actively used this information, and 73% of respondents that received temperature forecasts also said they used this information to make agricultural decisions. The use of other information, such as hydrology, extreme events, and climate change projections is very low.

On average, female headed households are less likely to use the information that they have received to make agricultural decisions than male headed households. Except for extreme event advisories, Maseru is the district with a significantly greater proportion of households receiving weather information.

Households in the mountain areas tend to use information on extreme events more than any other agro zone, but for all other types of information, households in the Senqu River Valley are more likely to actively use the weather information.

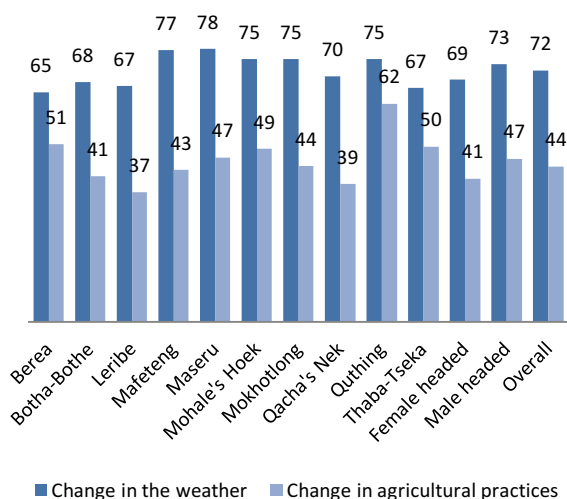


Figure 34: Percentage of people that have perceived changes in the weather and then percentage of those who had changed their agricultural practices as a result

Other than forecasts of rainfall, households on average receive very little information on the weather. 69% of respondents indicated that they received rainfall forecasts, while only 18% indicated

⁹ Referring to movement, distribution, and quality of water (e.g. Flooding)

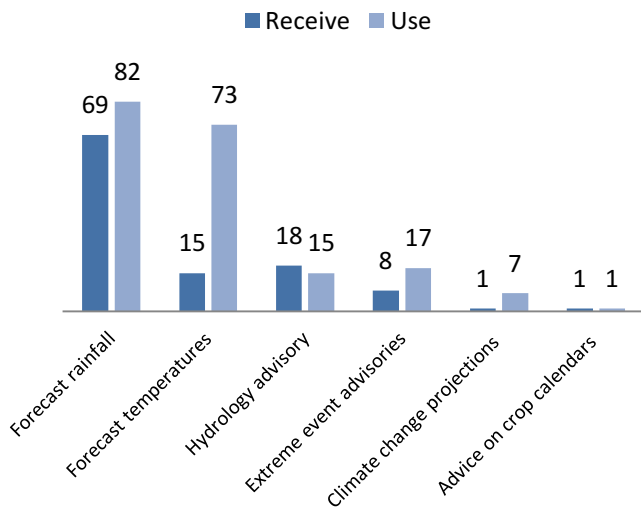


Figure 35: Access and use of weather information

In addition to asking respondents what type of weather information they receive and actively use, we also inquired about the sources of information that the household has access to. The order of most common answers is similar to the answers about the way respondents had heard about climate change. Again radio (69%), television (28%), and fellow farmers (19%) were most commonly indicated (Figure 36). Female headed households were less likely in general to have access to information, but were more likely to have access to information through community groups than male headed households. Access to information through government extension appears to be highest in the Mafeteng district and lowest in Berea, Quthing, and Thaba-Tseka. Thaba-Tseka appears to be the district that fares the worst in terms of access to information, with 28% of households indicating that they don't have any access.

Climate

The majority of respondents had heard of the term 'Climate Change' either through the radio, TV or through information exchange with fellow farmers.

The majority of respondents had observed a change in weather patterns since they were young but only half of them had changed their agricultural practices as a result.

Delayed planting is the most common response to a changing climate.

Other than forecasts of rainfall, households on average receive very little weather related information.

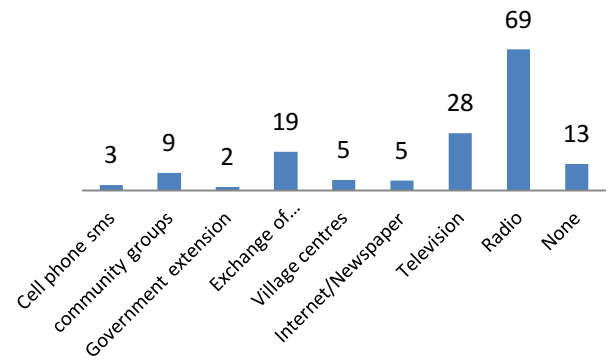


Figure 36: Access to weather information

Results pertaining to the Wool and Mohair Promotion Project (WAMPP)

The Wool and Mohair Promotion Project is national in size, and therefore the MPAT sample encompassed all ten districts of the country. Given that WAMPP addresses all aspects of the wool and mohair value chain, questions pertaining specifically to wool and mohair production, and to the WAMPP log frame were added to the MPAT questionnaire. These questions tend to provide information on outputs rather than outcomes.

As seen in the previous section, respondents are asked about their access to information services. The anticipated **output 1.2** in WAMPP's log frame is that 50,000 households are covered by new or improved climate information services. Increased access and use of climate information should be reflected in the MPAT mid-term and end-term reports if WAMPP's Component A has reached beneficiaries as expected.

One major problem that Lesotho is facing is overstocking and overgrazing. Part of WAMPP's goals is to introduce better breeds and to address overgrazing by reducing stock numbers. In the MPAT sample, 53% of respondents had sheep, and 30% had goats. The most common flock size for both sheep and goats is of 1-5 animals. However, in some districts this is much higher: in Mokhotlong for example, 20% of households indicated that they had flocks of between 20 and 50 sheep.

While MPAT does not enquire about the quality of wool and mohair sold (which would inform **outcome 2** of the log frame¹⁰) it does ask respondents how many kgs of wool and mohair they have sold in the past 12

¹⁰ This information will be sourced at each shearing sheds across the country

months. 81% of sheep owners produced wool, and 77% of goat owners produced mohair. A livestock owner sells on average 32 kgs of wool in a year, and/or 27 kgs of mohair. Mokhotlong, a mountain area, is the district in which wool and mohair production is greatest. **Outcome 2** anticipates that

average wool and mohair yields increase from 2.64kg of wool to 3kg per head and 0.75kg of mohair to 1kg by the end of the project. In order to monitor and evaluate this, data provided from each local shearing shed will be required to complement this baseline, the mid-term, and end-term MPAT reports.

Table 41: Ownership of sheep and goats in MPAT sample

District	Number of sheep						Number of goats					
	No	1-5	6-10	11-20	21-50	50+	No	1-5	6-10	11-20	21-50	50+
Berea	44	32	13	5	6	1	55	25	13	6	1	0
Botha-Bothe	40	22	14	16	3	5	62	13	8	8	6	3
Leribe	54	19	14	4	5	3	80	10	4	3	2	1
Mafeteng	43	25	6	14	11	2	85	9	4	1	1	0
Maseru	63	11	5	13	4	5	65	11	6	5	11	1
Mohale's Hoek	45	21	17	8	8	2	67	12	11	6	5	0
Mokhotlong	35	10	15	13	20	8	48	10	8	25	8	3
Qacha's Nek	26	30	4	22	13	4	65	22	9	0	4	0
Quthing	61	20	7	2	9	2	52	22	11	11	4	0
Thaba-Tseka	28	16	12	19	16	9	60	14	2	14	7	2
Female headed	58	21	9	6	3	2	75	13	4	5	2	1
Male headed	41	21	12	12	11	4	67	13	8	6	5	1
Overall	47	21	11	10	8	3	70	13	7	6	4	1

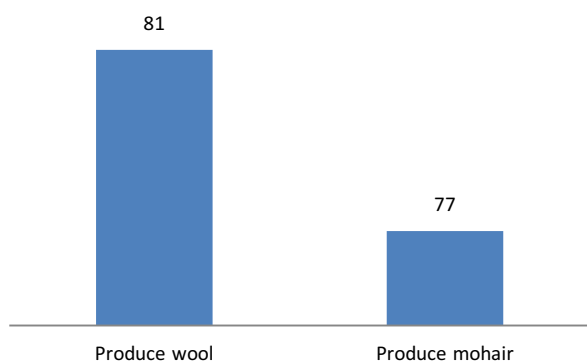


Figure 37: Percentage of livestock owners producing wool and mohair

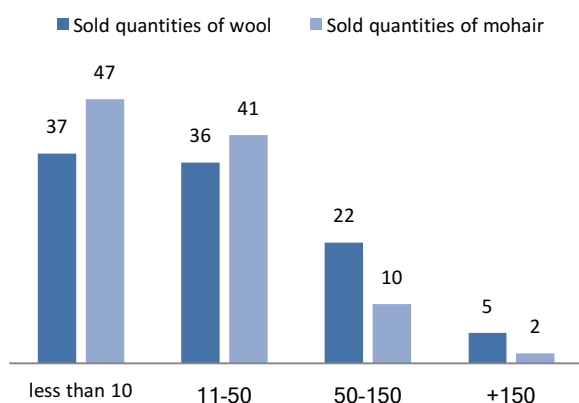


Figure 38: Percentage of livestock owners selling wool and mohair

Table 42: Use and availability of commercial feeds for livestock

District	Use commercial supplement feeds				Availability of commercial feeds	
	No, don't need	No, can't afford	Yes	Don't know	Yes	No
Berea	11	49	40	0	68	32
Botha-Bothe	25	32	41	2	65	35
Leribe	24	29	47	0	60	40
Mafeteng	6	38	56	0	66	34
Maseru	11	39	50	0	83	18
Mohale's Hoek	14	55	32	0	76	24
Mokhotlong	25	48	28	0	55	45
Qacha's Nek	26	39	30	4	57	43
Quthing	20	39	41	0	68	32
Thaba-Tseka	19	33	44	5	53	47
Female headed	17	47	36	0	66	34

Component B of WAMPP addresses animal health and productivity and **outcome 2** aims for 75% of small ruminant producers to adopt improved feeding practices by the end of the project. One of the means to improve feeding practices is by providing supplementary commercial feeds. To track this, the additional questions in this survey investigated the current use and availability of supplementary commercial feeds. Currently, 38% of livestock owners cannot afford commercial feeds and out of those that can afford to purchase commercial feeds, 66% responded that they could purchase them in their local constituency. Ideally, the proportion of farmers supplementing the feeds with commercial feeds will increase, as well as their ability to purchase such feeds in their local area.

Male headed	16	34	49	1	66	34
Overall	16	38	45	1	66	34

Through the introduction of superior breeds of livestock and rolling out of trainings and awareness raising, WAMPP aims to address the national problem

of overstocking and overgrazing. Culling unproductive animals not only helps to protect grasslands and rangelands, but can also facilitate livestock owners to use their resources (time, money, etc.) more efficiently. The MPAT results show that, on average, 65% of livestock owners do not cull unproductive animals. This could be explained by many reasons, including the traditional desire to keep as many animals as possible as collateral. As such, addressing the issue of overstocking is multi-layered and cultural motives need to be respected and addressed. That said, if a livestock owner did want to cull unproductive animals, the MPAT results show that he/she may find it challenging to do so in the first place. 78% of respondents indicated that they do not receive any guidance on culling, and 88% responded that there are no organised marketing systems in their area.

82% of respondents indicated that they were not members of the Lesotho National Wool and Mohair Grower's Association, and were not members of any association at all (80%). As LNWMGA is not only a donor but also an implementing partner in WAMPP, this type of information could help in targeting and identifying beneficiaries. Association membership is often beneficial for smallholder farmers, and thus it is recommended that the reasons as to why so many of the MPAT respondents are not members of an association should be further investigated.

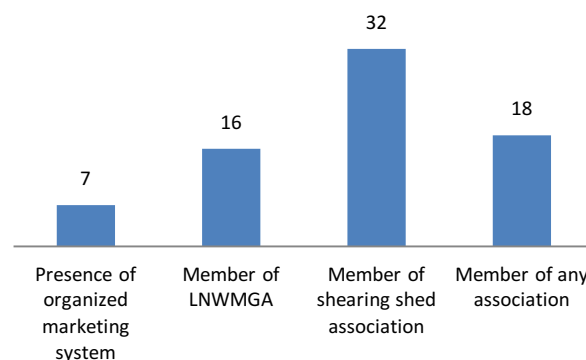


Figure 40: Percentage of livestock owners with membership in various associations

Output 2.3 concerns the establishment of Community Based Animal Health Services. The MPAT results show that 81% of livestock owners vaccinate their ruminants, but only 30% receive guidance on prevention and treatment of diseases. To meet **output 2.3**, the MPAT results at mid-term and end-term should reflect an increase in the percentage of people with access to guidance on prevention and treatment and vaccinate their ruminants (in fact the log frame stipulates that 100% of sheep and goats should be vaccinated against diseases, such as anthrax and sheep scab). While the incidence of livestock death due to disease appears to be relatively low (86% of respondents say that 1-10% of their livestock was lost in the past 12 months), WAMPP should aid in decreasing this number to virtually nil. Following trainings planned under **Component B** of WAMPP, beneficiaries should also be increasing their practice of veterinary skills such as flushing ewes, creep feeding, crutching of ewes, etc. From table 43 below, we notice that these skills are not habitually practiced and leave much room for improvement.

■ Cull unproductive animals
 ■ Guidance on how to cull unproductive animals

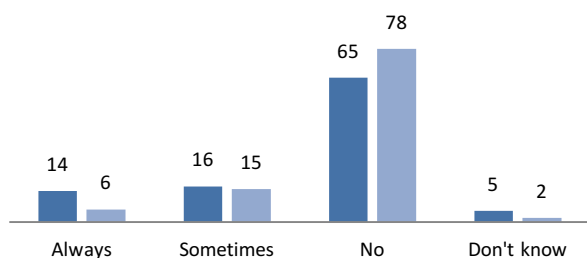


Figure 39: Culling habits

Component C of WAMPP focuses on the increase in market returns to livestock producers from wool and mohair systems. According to **Output 3.1a**, 135 Shearing Shed Associations should be trained in enterprise management, have a business plan, and operate in profit by the end of the project. Figure 41 shows that only 25% of livestock owners in the MPAT sample are able to classify wool and mohair, 30% have access to wool and mohair marketing information, and 28% are able to calculate profitability. **Output 3.2** specifically mentions women receiving training in bookkeeping, and therefore the mid-term and end-term MPAT results are expected to show a higher percentage of livestock keepers (disaggregated by gender) that can calculate profitability. A very small percentage of MPAT respondents indicated that they were involved in the cottage industry (2%).

Table 43: Veterinary practices across the districts

District	Vaccinate livestock	Guidance for prevention/treatment	Practiced veterinary skills								
	Yes	Yes	Flushing ewes/rams	Streaming ewes at 3 month pregnancy	Creep feeding lambs	Giving a boost to pregnant ewes	Feeding ewes more during pregnancy	Feeding ewes more after they've dropped	Crutching of ewes	None	Other
Berea	78	27	10	20	10	12	20	22	0	45	10
Botha-Bothe	78	30	26	30	19	12	14	30	12	35	12
Leribe	74	30	25	28	14	18	18	22	14	37	9
Mafeteng	86	32	41	39	19	7	31	32	19	25	10
Maseru	80	41	17	29	20	17	37	51	12	39	7
Mohale's Hoek	83	36	45	21	15	9	15	15	21	38	13
Mokhotlong	80	33	13	28	10	13	10	15	10	45	13
Qacha's Nek	83	0	22	17	0	0	22	28	11	44	6
Quthing	83	22	19	13	6	6	13	13	9	56	16
Thaba-Tseka	93	14	45	28	0	21	41	41	17	14	14
Female headed	72	24	19	19	9	5	18	24	11	47	11
Male headed	85	32	31	31	15	15	24	28	14	32	11
Overall	81	30	27	28	13	12	22	27	13	36	11

Table 44: Incidence of livestock death due to disease in the last 12 months

District	0-10%	11-25%	26-50%	51-75%	76-100%	Don't know
Berea	80	2	1	4	0	13
Botha-Bothe	83	8	2	0	2	6
Leribe	88	3	1	1	0	8
Mafeteng	89	4	2	0	0	5
Maseru	88	1	1	0	0	10
Mohale's Hoek	80	6	0	3	0	11
Mokhotlong	75	10	0	0	0	15
Qacha's Nek	91	0	0	4	0	4
Quthing	89	4	0	4	0	2
Thaba-Tseka	86	9	0	0	0	5
Female headed	88	3	2	1	0	6
Male headed	85	5	1	1	0	9
Overall	86	4	1	1	0	8

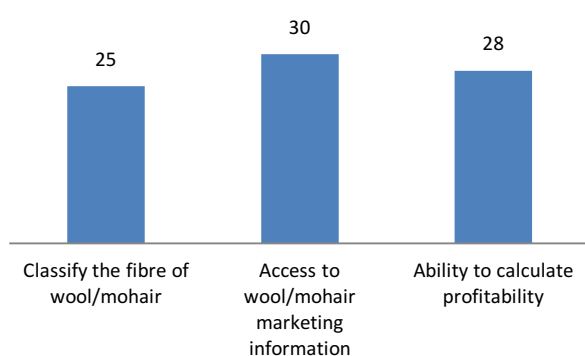


Figure 41: Ability to classify fibre, calculate profitability, and access to marketing information

Output3.1b of Component C is to provide shearing shed facilities and infrastructure. This includes renovating 46 existing shearing sheds, which should

facilitate livestock keepers' access. MPAT helps to inform current access to shearing sheds by asking respondents how long it takes them to get to the nearest shearing shed.

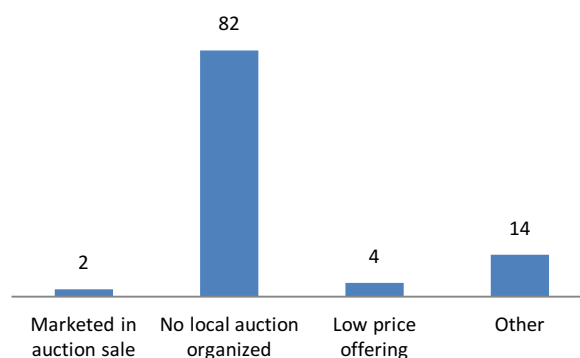


Figure 42: Participation in auction sales

It is anticipated that the mid-term and end-term report will reflect lower times necessary for individuals to reach shearing sheds.

Output 3.3 of WAMPP is to construct district livestock auctions and slaughter slabs. Currently, 96% of livestock owners do not participate in auction sales, with the main reason being that there are none to

participate in (82%). It is expected that by the end of WAMPP, this proportion will have increased significantly.

Table 45: Time taken to reach nearest shearing shed

District	0-30 minutes	30-60 minutes	1-2 hours	2-4 hours	half a day	One day	More than one day	Don't know
Berea	2	8	15	35	3	0	0	37
Botha-Bothe	2	9	28	26	9	5	0	21
Leribe	8	20	15	14	1	1	0	41
Mafeteng	7	20	19	23	7	1	2	22
Maseru	0	22	22	15	5	2	0	34
Mohale's Hoek	15	36	4	9	4	13	0	19
Mokhotlong	14	26	14	20	3	0	0	23
Qacha's Nek	6	11	0	22	22	22	0	17
Quthing	3	3	22	25	9	19	0	19
Thaba-Tseka	7	17	3	31	28	3	3	7
Female headed	5	14	20	15	9	1	1	35
Male headed	7	20	14	24	6	6	1	23
Overall	6	18	16	21	7	4	1	27

Conclusion

Rural poverty has many dimensions that are often specific to a country and a particular context, which can make it difficult to assess and measure. MPAT was developed in order to allow project managers, government officials, researchers and others to determine which dimensions of rural livelihoods likely require support and whether an enabling environment is in place for beneficial rural development.

By going in depth into the results of each component, this report provided insight into the rural livelihoods of the Basotho across the Kingdom of Lesotho, and will hopefully assist development practitioners involved in the Wool and Mohair promotion Project (WAMPP) and the Lesotho Adaptation for Small-scale Agricultural Production (LASAP) Project to assess whether the interventions, or planned interventions, are adequate in this current context.

Lesotho remains one of the poorest countries in Sub-Saharan Africa with a Human Development Index of 0.520 (ranking 159th out of 189 countries).¹¹ An estimated 57.1% of Basotho¹² live below the national poverty line, and 34% below the food poverty line of Maloti 138 (USD10.30) per adult per month.¹³ Poverty is highest in rural areas, inhabited by 77 % of the country's population (UNDAF 2019-2023).

The Multidimensional Poverty Assessment Tool allowed us to gain insight into which dimensions of rural livelihoods are the weakest, as perceived by the rural population itself. The results from the MPAT survey indicate that while rural households have high levels of gender and social equality as well as education, and do not forego periods of time without food to eat, they suffer from a lack of opportunity to increase their income sources.

As agricultural production is the source of livelihoods for the majority of the rural population, it is concerning that despite a relatively good quality of land, the ability for households to improve their agricultural production is limited by a low quality of land tenure, an inability to acquire sufficient seed, fertilizer, and farm inputs, as well as a low adoption of good agricultural practices. Results show that

households perceive themselves as having a lack of opportunity to diversify their income sources (through the provision of skills or employment) or to be able to borrow money in order to invest in agricultural production or another income generating activity.

This links directly to the perceived vulnerability levels, which were captured as very high in the survey. Households appear to be continuously in a state of coping, and worried about the future. The lack of perceived support is evident with households relying on families as their sole source of assistance in case of need.

Given the results, the goal of both WAMPP and LASAP to improve resilience is considered highly adequate in the context of Lesotho.

The survey data suggests that the priorities for the project should be on climate change adaptation, resilience to shocks, and assets (farm and non-farm). Most households are highly vulnerable to climate shocks and stresses and the large proportion of households that have farming as their main income source do not engage in climate adaptation practices. Given that land degradation is a major issue in Lesotho, the fact that very few households engage in land and soil conservation techniques could be interpreted as an area of priority under WAMPP's component A. The Project Director, M&E Officer, and Component Managers may wish to consult this report to inform any decision-making in resource allocation.

A follow-on survey for impact evaluation of the project is planned in 2020 (3 years after the baseline survey). The survey design allows a panel data approach in which the same households can be revisited. The sample size of the baseline (1320) was set to allow for a respondent attrition (inability to interview the same household) of 25% and still have an adequately powered study. If the attrition is likely to be too high, the follow-on survey could use a cross-sectional sample instead, following the same sampling method as outlined in the introduction. Ideally, the follow-on survey should be conducted during the same period as the baseline survey (November-December). However, in December, many schools are closed for the Christmas holidays and therefore the month of November is best suited for data collection.

¹¹ UNDP (2018) Briefing note for countries on the 2018 statistical Update: Lesotho. [online] Available at :

http://hdr.undp.org/sites/all/themes/hdr_theme/country-notes/LSO.pdf

¹² People of Lesotho.

¹³ Lesotho Common Country Analysis (2017)

The baseline survey was conducted when WAMPP and LASAP did not have a clear targeting strategy in place. It is advised that the MPAT results inform the targeting strategy and that beneficiaries are identified as soon as possible. In this case, part of the MPAT sample can be confirmed as a control group and allow for comparisons with the follow-on survey in 3 years. If implemented rigorously, the follow-on survey will allow the PMU to identify whether activities are having their intended effect, and to make changes in programme implementation if necessary. The aim of such surveys is to keep the project focused on goals, strategy, programme efficiency, and hold it accountable for results.

Annex 1 : Sample

District	Constituency	Council	VILLAGE NAME	Village number	No of HHs to be interviewed	Household number	
						from	to
BEREA	BELA-BELA	Koeneng Council	Bela-Bela (Moreneng)	1	20	1	20
BEREA	MOSALEMANE	Makeoana Council	Ha Khopo	23	20	441	460
BEREA	NOKONG	Mapoteng Council	Leboteng (Ha Telebate)	24	11	461	471
BEREA	NOKONG	Mapoteng Council	Libakha	25	9	472	480
BEREA	MALIMONG	Tebe-Tebe Council	Masuoeng	26	20	481	500
BEREA	TEYATEYANENG	Maluba-lube Council	Ha Motjoka	27	20	501	520
BEREA	PULANE	Motanasela Council	Ha Ramothupi (Pitsaneng)	28	20	521	540
BEREA	SEQONOKA	Kanana Council	Ha Souru	29	20	541	560
BOTHA-BOTHE	BOTHA-BOTHE	Lipelaneng Council	Likoting	2	20	21	40
BOTHA-BOTHE	HOLOLO	Likila Council	Sheeshe	3	20	41	60
BOTHA-BOTHE	MOTETE	Sekhobe Council	Liqhobong	4	20	61	80
BOTHA-BOTHE	HOLOLO	Likila Council	Joala-Boholo	30	20	561	580
BOTHA-BOTHE	MOTETE	Moteng Council	Marabeng	31	20	581	600
BOTHA-BOTHE	BOTHA-BOTHE	Lipelaneng Council	Ha Sechele	32	20	601	620
LERIBE	HLOTSE	Linare Council	Ha Mphuthing (Sebothoane)	5	20	81	100
LERIBE	HLOTSE	Linare Council	Lisemeng II	6	20	101	120
LERIBE	LIKHETLANE	Hleoheng Council	Ha Litsaoko (Ha Maqele)	7	20	121	140
LERIBE	LIKHETLANE	Hleoheng Council	Hleoheng	8	20	141	160
LERIBE	MALIBA-MATŠO	Limamarela Council	Mamohau	9	20	161	180
LERIBE	MAPUTSOE	Khomokhoana Council	Ha Motlalehi	10	20	181	200
LERIBE	MAPUTSOE	Khomokhoana Council	Popopo	11	20	201	220
LERIBE	PEKA	Manka Council	Ha Rantuba	12	20	221	240
LERIBE	THABA-PHATSOA	Fenyane Council	Ha Ramapepe	13	20	241	260
LERIBE	TSIKOANE	Litjotjela Council	Hloahloeng (Ha Poulo)	14	20	261	280
LERIBE	MALIBA-MATŠO	Seshote Council	Ha Sehloho (Ha Theko)	33	20	621	640
LERIBE	THABA-PHATSOA	Motati Council	Liphokong	34	13	641	653
LERIBE	THABA-PHATSOA	Motati Council	Tarabane	35	7	654	660
LERIBE	PELA-TŠOEU	Menkhoaneng Council	Ha Tjotji	36	20	661	680
LERIBE	MOHOBOLLO	Sephokong Council	Ha Mosiuoa	37	20	681	700
LERIBE	TSIKOANE	Litjotjela Council	Ha Lesitsi (Likhakeng)	38	20	701	720
LERIBE	MAPUTSOE	Khomokhoana Council	Ha Mathata	39	20	721	740
LERIBE	PEKA	Manka Council	Ha Lepholisa	40	20	741	760
MAFETENG	KOLO	Mamantšo Council	Matsoseng	15	20	281	300

District	Constituency	Council	VILLAGE NAME	Village number	No of HHs to be interviewed	Household number	
MAFETENG	LIKHOELE	Makholane Council	Ha Ramokoatsi	16	20	301	320
MAFETENG	MAFETENG	Makaota Council	Ha Ramokhele	17	20	321	340
MAFETENG	MAFETENG	Makaota Council	Matlapaneng	18	20	341	360
MAFETENG	MAFETENG	Makaota Council	Phahameng	19	20	361	380
MAFETENG	MALIEPETSANE	Tajane Council	Ha Lesaoana	20	20	381	400
MAFETENG	THABA-PHECHELA	Metsi-Matšo Council	Ha Khoro	21	20	401	420
MAFETENG	THABA-PHECHELA	Metsi-Matšo Council	Matlatseng	22	20	421	440
MAFETENG	THABA-PHECHELA	Metsi-Matšo Council	Ha Motholo	41	20	761	780
MAFETENG	THABA-TŠOEU	Mathula Council	Ha Moseli	42	20	781	800
MAFETENG	MATELILE	Malakeng Council	Ha Phatela	43	19	801	819
MAFETENG	MATELILE	Malakeng Council	Ha Ramakhakhe	44	1	820	820
MAFETENG	LIKHOELE	Makholane Council	Ha Seetsi	45	20	821	840
MAFETENG	MAFETENG	Makaota Council	Borokhong	46	20	841	860
MASERU	THABA-BOSIU	Qiloane Council	Ha Lesoiti	47	20	861	880
MASERU	MACHACHE	Ratau Council	Ha Seoehlana	48	20	881	900
MASERU	MAAMA	Manonyane Council	Liphakoeng	49	20	901	920
MASERU	KORO-KORO	Mohlakeng Council	Makoaeng	50	20	921	940
MASERU	ROTHE	Lilala Council	Ha Tsautse	51	20	941	960
MASERU	MATSIENG	Makhoarane Council	Morija	52	20	961	980
MASERU	MALETSUNYANE	Semonkong Council	Ha Lepae	53	20	981	1000
MOHALE'S HOEK	TAUNG	Siloe Council	Ha Mahlehle	54	20	1001	1020
MOHALE'S HOEK	MOHALE'S HOEK	Motlejoeng Council	Likhutlong	55	20	1021	1040
MOHALE'S HOEK	MEKALING	Khoelenya Council	Maphutsaneng (Aupolasi)	56	20	1041	1060
MOHALE'S HOEK	QAQATU	Phamong Council	Phamong (Aupolasi)	57	20	1061	1080
MOHALE'S HOEK	KETANE	Seroto Council	Ha Makara	58	18	1081	1098
MOHALE'S HOEK	KETANE	Seroto Council	Thepung	59	2	1099	1100
MOKHOTLONG	MALINGOANENG	Khubelu Council	Masalla	60	20	1101	1120
MOKHOTLONG	SENQU	Khalahali Council	Phahameng	61	20	1121	1140
MOKHOTLONG	BOBATSU	Rafolatsane Council	Thoteng	62	20	1141	1160
QACHA'S NEK	QACHA'S NEK	Letloepe Council	Terai Hoek	63	20	1161	1180
QACHA'S NEK	TSOELIKE	Ratšoleli Council	Ha Rafatše	64	20	1181	1200
QUTHING	TELE	Matsatseng Council	Kobolong	65	10	1201	1210
QUTHING	TELE	Matsatseng Council	Ndongwane	66	10	1211	1220
QUTHING	SEBAPALA	Ha Nkoebe Council	Ha Motsapi	67	20	1221	1240
QUTHING	QHOALI	Mphaki Council	Mphaki (Makhalong)	68	20	1241	1260
THABA-TSEKA	MANTŠONYANE	Mphe-Lebeko Council	Liphokoaneng	69	20	1261	1280
THABA-TSEKA	THABA-TSEKA	Thaban'a Mahlanya Council	Ha Motsepa	70	20	1281	1300
THABA-TSEKA	SEMENA	Bobete Council	Sekoting-sa-Mofao	71	20	1301	1320

