

## Impact of the COVID -19 lockdown on pastoralists of India ———





Centre for

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Pastoralism

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### List of Acronyms

AAY	Antyodaya Anna Yojana
ACGPMS	All Changthang Pashmina Grower Marketing Society
BPL	Below Poverty Line
CfP	Centre for Pastoralism
FCS&CA	Department of Food, Civil Supplies and Consumer Affairs
FMD	Foot and mouth disease
FRA	Forest Rights Act
G&B	Gujjar and Bakkarwal
J&K	Jammu and Kashmir
MoEFCC	Ministry of Environment, Forest and Climate Change
MoHA	Ministry of Home Affairs
NDDB	National Dairy Development Board
NT	Nomadic tribes
OBC	Other Backward Class
PDS	Public distribution system
PHC	Primary health centre
PVTG	Particularly vulnerable tribal group
SDM	Sub divisional magistrate
WASSAN	Watershed Support Services and Activity Network
UT	Union Territory

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### **Executive Summary**

1. This report captures some of the core problems that pastoral communities have experienced during and following the COVID-19 induced national lockdown imposed in March 2020. It was undertaken following a pilot study carried out by the Centre for Pastoralism (CfP) in April 2020 with a limited set of respondents to assess the impact of the COVID-19 lockdown on pastoralists across the country. The survey suggested that pastoralists experienced many of the difficulties that farming communities have spoken of. However, some impacts were specific to pastoralists, and were a function of their mobile lifestyle and, in some instances, their identities.

2. CfP staff collaborated with colleagues in academic institutions and NGOs in various parts of the country to examine this issue through a detailed survey in the second half of 2020. The survey was conducted in nine Indian states and two union territories: Andhra Pradesh, Gujarat, Himachal Pradesh, Jammu & Kashmir, Karnataka, Ladakh, Maharashtra, Rajasthan, Tamil Nadu, Telangana, and Uttarakhand. A total of 300 interviews were conducted in which individuals from approximately 30 pastoral communities were spoken to between June and September 2020. The impact of the lockdown was examined with regard to: pastoralist movement, access to forage, access to markets, changes in income and expenditure, availability of labour for herding, access to veterinary care services, availability of ration, social stigma experienced during migration or in accessing markets, and herder perceptions about the lockdown's impact on livelihoods compared to other professions.

3. Our survey showed that a majority (78%) of respondents were on migration during the lockdown. One positive impact of the lockdown that respondents spoke of was that the absence of traffic eased their movement considerably. But the lockdown also had certain negative impacts on pastoralists' movement. Three specific types of difficulties were reported: (i) restricted access to their pastures, especially those in forest and protected areas; (ii) a disruption in their usual patterns of movement due to the sudden imposition of the lockdown which delayed or interrupted their migrations; and (iii) difficulties in accessing fodder for their animals from market sources.

4. The main challenges that the lockdown posed included higher expenditure and reduced income levels, inadequate veterinary care services, and social stigma. The steep rise in expenditure was caused by inflation in the prices of fodder, ration, wage rates of hired labour, and prices of medicines for animals. Pastoralists had no choice but to incur these expenses. Alongside a rise in their expenditures, herders saw a decline in their income levels due to difficulties faced in selling milk and animals. Buffalo and camel herders predominantly reported facing such difficulties and constituted 26% of our respondents. This problem occurred because dairy and livestock markets in most states were not operational during the lockdown. The share of respondents who reported facing difficulties in selling animals was higher at 52%. Most of these respondents belonged to Gujarat, Maharashtra, Tamil Nadu, Telangana, Andhra Pradesh, and Jammu & Kashmir. All of these challenges were directly related to the restrictions on movement imposed by the lockdown. Pastoralists also had to pay higher than normal sums of money for accessing limited transport facilities. To summarise, the lockdown caused a high degree of financial stress for pastoralists.

5. There was a degree of variation in the way lockdown impacted different communities. For instance, those who derive their incomes solely from the sale of milk were affected much more than other communities that rely on a combination of sources for their livelihood. With milk being a perishable commodity, these pastoralists were forced to throw away large quantities of milk due to a lack of buyers. While some herders did convert milk into ghee, which has a longer shelf life than milk, in the hope that they would sell it later, there were limits to how much milk could be converted to ghee. The sale of animals was affected by the closure of markets, and in some instances, this resulted in immediate cash flow problems. However, herders had some security in the knowledge that they could sell their animals at a later date, once the lockdown was lifted, an option not available to farmers or milk producers with perishable commodities. In the Deccan region, the financial stress due to reduced incomes was mitigated to some extent from the revenues generated by the sale of manure. But this additional source of support was conspicuously missing in the western and Himalayan regions.

6. Another major aspect in which experiences varied considerably was with regard to social stigma. The situation was much worse for communities that were stigmatised based on their religious identity. This was a direct consequence of the 'Tablighi Jamaat' rumours spread through national media channels in March 2020. These rumours alleged that the attendees of an Islamic congregation, the Tablighi Jamaat, held in New Delhi in February-March 2020 were on a deliberate mission of spreading Coronavirus across the country. In reality, these attendees were, like many other individuals throughout the country, caught by surprise due to the sudden imposition of the nation-wide lockdown and were desperate to return home to avoid getting stranded in Delhi for an unknown period.

7. Muslim herders from Uttarakhand and Himachal Pradesh reported experiencing much stronger forms of discrimination as compared to the communities living in the Deccan and western parts of the country. For instance, the Van Gujjars and Gujjars of Uttarakhand and Himachal Pradesh, both of whom are Muslims, reported their milk sales were impacted drastically as their long term buyers refused to buy their milk on account of their religion.

8. Where this stigma occurred due to fears of COVID-19 transmission linked to the mobile lifestyle of pastoralists, the degree of difficulties faced was comparatively less. In the Deccan region, pre-existing ties between farmers and pastoralists helped diffuse conflicts linked to COVID-19. Moreover, it is uncommon to find pastoralists in the Deccan region who follow Islam. Discrimination based on religion was not completely absent from the region, though it played out differently. For instance in Maharashtra, Muslim traders who bought animals from the herders were not allowed to enter certain villages, which decreased animal sales for pastoralists.

9. In all states, accessing veterinary care was difficult during the lockdown as public veterinary services had shut or were functional for limited periods. Accessing veterinary services during the lockdown was six times harder than in normal times. The share of respondents who could not access any veterinary care services amounted to 43%. A meagre 3% could access health camps and vaccination services. And 27% could not access medicines while the remaining 73% relied on private drug stores for buying medicines. Since prices are higher at these stores as compared to public health centres, a majority of the communities spent more than usual on medicines.

10. The lack of access to veterinary services also led, in some instances, to animal deaths leading to substantial financial losses for the herders. The only exception with regard to provisioning veterinary services was Himachal Pradesh where the state government took proactive steps to ensure that public veterinary services like dipping - a practice in which sheep are dipped in medicines to protect them from diseases - continued to function throughout the lockdown.

12. Pastoralists on the move normally obtain rations from village kirana shops or shops in small towns. Many pastoralists across the country reported that villages that are normally welcoming were wary of potential transmission of COVID-19 and did not allow mobile pastoralists to enter the village. Ration shops in all states were functioning for limited periods, which in a few instances, coincided with the grazing time of animals. Herders had to undertake a careful balancing act to ensure that they could find sufficient food for their animals and themselves. Social ties between farmers and herders in the Deccan region played a crucial role in supporting herders' access to ration supplies. In the Himalayan and western regions, examples of such cooperation were fewer. Government support in providing ration to pastoral communities was limited across the states. 13. Some of the variations in herders' experience of the lockdown was also a function of specific measures taken by different governments. Himachal Pradesh stood out for its proactive engagement on the herder issue, with a government order instructing officials to allow herder movement (on the assumption that herders tend to move in small groups, and tend to stay on the periphery of human habitation). Uttarakhand went to the other extreme of prohibiting Van Gujjar migration over the entire year, an action that resulted in substantial stress for the community. Other states varied in the degree of flexibility with which the lockdown was enforced or services provided.

14. Civil society organisations played a key role in helping herders in different parts of the country to tide over the difficulties brought by the lockdown. For instance, the Himachal Ghumantu Pashupalak Mahasabha worked closely with the government to facilitate testing, as well as providing medical care and ration where needed. In other states, civil society organisations distributed ration kits to pastoralist families in the face of inadequate availability of grocery stores. Consider, for example, the Van Gujjar Yuva Sangathan in Uttarakhand and the Jain traders of Sirohi district, Rajasthan. Both of them distributed ration to herders in their respective states. These instances highlight the need for forming partnerships between state agencies and civil society organisations to deal with crises of such magnitude.

15. Given the likely continued periodic imposition of regional lockdowns, a list of recommendations is provided at the end of this report.

### Introduction -

This report attempts to capture some of the core problems that pastoral communities have experienced during and following the COVID-19 induced national lockdown imposed in March 2020.

'Pastoral' communities, as the name suggests, are those who engage in pastoralism. Pastoralism as a practice involves the seasonally mobile management of domesticated animals, where a significant part of their forage is obtained from common lands and a substantial portion of the household revenues accrue from such animal husbandry. At the heart of Indian pastoralism, there is a need to access a wide variety of vegetation forms under a range of tenurial categories, including private lands, village commons, forest department managed lands, and unclaimed "wastelands". Reliable numbers on the pastoralist population are hard to come by, in part because of problems of definition, but also because they are not separately enumerated during India's decadal census operations. According to some estimates, 20 million pastoralists live in India and can be found distributed across most states in the country. Many of these pastoralists spend large parts of the year on migration, within their own states or moving through other states.

Changpa women cross a river with wool from their sheep, Ladakh. Photo credits: Ritayan Mukherjee



# Surveying the impact of the lockdown on pastoralists

In April 2020, CfP undertook a quick telephonic survey with a limited set of respondents to assess the impact of the COVID-19 lockdown on pastoralists across the country. The survey suggested that pastoralists experienced many of the difficulties that farming communities have spoken of. Some impacts, however, were an outcome of their mobility and, in some instances, their identities. Both were specific to pastoralists. The results from the survey were shared in the form of a report (See Annexure I for findings). In June 2020, CfP staff met remotely with colleagues in academic institutions and NGOs in various parts of the country to explore interest in undertaking a more in-depth survey to better understand how pastoralists were affected by the lockdown and its aftermath. Several individuals expressed an interest in such a study. This report is an outcome of this more detailed survey undertaken during the second half of 2020.

This survey was conducted in nine Indian states and two union territories: Andhra Pradesh, Gujarat, Himachal Pradesh, Jammu and Kashmir, Ladakh, Karnataka, Maharashtra, Rajasthan, Tamil Nadu, Telangana and Uttarakhand. A total of 300 interviews were conducted and individuals from approximately 30 pastoral communities were spoken to between June and September 2020. Focused group discussions with 79 individuals were held with members of different communities in Maharashtra. Separate state reports have been written by Kanna K. Siripurapu (Andhra Pradesh and Telangana), Ovee Thorat and Krutika Haraniya (Gujarat), Cathleen Kaur (Himachal Pradesh), Anita Sharma (Jammu and Kashmir), Iravatee Majgaonkar and Sushma Sharma (Karnataka), Stanzin Namgail (Ladakh), Ashwini Kulkarni (Maharashtra), Jagdish Paliwal, Maganlal Raika, Savaram Raika, Meenal Tatpati and Shruti Ajit (Rajasthan), Mathivanan M. (Tamil Nadu), and Amit Rathi (Uttarakhand). These state level reports will be published in a consolidated document separately. This national level report presents a detailed summary of the findings that have been reported from all the states.

This report begins with a brief note on pastoralism in India to highlight the mobility of these communities as well as the geographic extent of the different states used by pastoralists, followed by the methodology used for this survey, and a summary of the major findings. It ends with a list of recommendations for the government.

### Understanding Indian pastoralism

Indian pastoralism occurs across three broad geographies – the Himalayas, the arid and semi-arid lands of western India and the semi-arid Deccan Plateau. Animal management follows a very different logic in each of these regions. Mobility, however, forms a key part of the logic in all three areas and serves specific objectives. These range from an attempt to take advantage of seasonal vegetation growth following rainfall or the melting of winter snows, avoidance of particularly heavy rainfall in some instances, taking advantage of agricultural stubble that needs to be cleared before the farmer can plant the next crop and so on.

Within the Himalayas, herders spend the summers and monsoons at high altitudes, grazing their animals on highly productive alpine pastures. Their winters are spent grazing scrub forests in the Himalayan foothills, and time in between is spent migrating between the two, over distances exceeding 200 kilometres. Animals are often penned on farmers' fields in the wintering areas, although this practice is in decline in this region. Apart from this, many herding communities own private land that family members cultivate as a separate income source.







Right Image: A herder with his goats in a thorn forest in Kachchh, Gujarat Picture credits: Ishaan Raghunandan Top Left Image: Penning sheep and goats in the Deccans, Wai, Maharashtra. Picture credits: Nipun Prabhakar Bottom Left Image: Sheep grazing on an alpine meadow, Kangra, Himachal Pradesh. Picture credits: Hashmat Singh

### Map 1: -

### Bakkarwal migratory routes in Jammu and Kashmir



The maps presented in this section are not meant to reflect the totality of pastoralism in any given state. For example, in the state of Uttarakhand, the Bhotia sheep herders present in both the eastern and western parts of the state have not been shown here since we were unable to generate the necessary data to map their migratory routes. Our larger objective in sharing these maps is to make two points: (i) herder mobility takes place over long distances and relatedly, (ii) in states with substantial herder populations, these communities are dependent for forage over more or less the entire state. This is a work in progress, and we hope to share more sophisticated maps in time to come.

## Map 2: Pastoralist migratory routes in Himachal Pradesh







In western India and the Deccan Plateau, pastoral movement is more closely aligned to rainfall events, with herders ranging far and wide during the hot season. During this time, they often provide penning services ahead of the monsoon. Their return to home bases coincides with plentiful vegetation and fodder following the rains. Though pastoralists in all three regions engage in penning to varying degrees, it is an activity that can be found predominantly in the Deccan region. Here, pastoralists are much more dependent on agricultural residue for forage as compared to the arid and semi-arid regions of western India and the Himalayas, where there is far greater dependency on the commons. In the Deccan, this reliance on agricultural residue occurs alongside farmers relying on the pastoralists' animals for adding rich and organic manure to their lands, a long-standing symbiotic relationship. This has been the foundation of the deep social bonds that exist between pastoralists and farmers of the Deccan.

### Map 4: -Pastoralist migratory routes in Gujarat



Another key difference between the pastoral systems of the Deccan and western India is that pastoralists in western India own little or no agricultural land. They are largely landless, unlike their Deccan counterparts who have some land holdings and traditionally practice subsistence farming when they return from their migratory travels in the monsoons.

### Map 5: -

Pastoralist migratory routes in Karnataka and Andhra Pradesh



To sum up, Indian pastoralists have a substantial presence in many states in the country, with extensive mobility resulting in a seasonal pastoralist presence over large sections of each state. India has varied types of pastoralism, with a large section that could be understood as agro-pastoralism, with complex inter-dependencies between pastoral and cultivating communities. Across all pastoral systems in India and to varying degrees, pastoralists are invited by cultivators to pen their animals on fallow fields or ahead of the monsoon (kharif) and/or winter (rabi) crops. For the duration that they provide these services, pastoralists graze their animals on both agricultural residue and village commons, or state or forest land. At other times of the year, they graze their animals in vast expanses of alpine meadows, thorn forests, mangroves, and tropical grasslands or simply along the roadside as they migrate between seasonal grazing grounds.

## Map 6: -

### Pastoralist migratory routes in Tamil Nadu



# Methodology adopted for the current survey

The purpose of this survey was to examine the impact of the nation-wide lockdown on Indian pastoralists. We discussed the methodology over multiple zoom calls which focused on formulating the questionnaire, the communities we wished to sample, the numbers of respondents we hoped for, and the anticipated structuring of the report.

By July 2020, limited movement had re-started due to which we decided the interviews would be undertaken in person where researchers were in a position to meet with pastoralists. However, we had anticipated that the bulk of interviews would be undertaken telephonically.

Questionnaire: The survey followed a questionnaire developed in late June 2020. This questionnaire was structured around the key issues that had arisen in our preliminary survey (Annexure I). We tested the first draft of our questionnaire by undertaking pilot interviews with pastoralists from several communities. The questionnaire was refined and finalised based on these pilot conversations (Annexure II).

This questionnaire was designed to examine the impact of the lockdown concerning the following issues: pastoralist movement, access to forage, access to markets, changes in income & expenditure, availability of labour for herding, access to veterinary care services, availability of ration, social stigma experienced on migration or in accessing markets and pastoralist perceptions about COVID-19's impact on livelihoods vis-à-vis other professions.



SETU field staff conducting a survey in Kachchh, Gujarat. Picture credits: Krutika Haraniya



Conducting surveys at Samad and Kharnak areas of Changthang, Ladakh. Picture credits: Stanzin Namgail

We decided to sample 20 households from each community with the expectation that this was a large enough number to generate the variability we hoped to capture via our survey. Sampling: Within each state, we surveyed pastoral communities that we considered to be distinct based on identity, animals managed, or degree of isolation. We felt this somewhat arbitrary categorisation would enable us to capture a wide variety of conditions under which pastoralists were functioning during the COVID-19 lockdown. We knew from our preliminary survey that identity had played a role in shaping how pastoral communities experienced the lockdown and we wanted to explore this issue further. We also assumed that the types of animals that a pastoralist managed were likely to influence the markets a herder needed to access (goat and sheep herders would need to access meat markets; cow and buffalo herders would need to access milk markets) and differing restrictions were likely to have differing impacts on these communities. Similarly, our interest in using the degree of isolation as a differentiator was premised on the idea that isolation would probably shape how the lockdown impacted a particular community.

Our categorisation is also arbitrary in that we were making a priori decisions regarding the intensity of sampling certain communities. We decided to sample 20 households from each community with the expectation that this was a large enough number to generate the variability we hoped to capture via our survey. Unfortunately, we were not always able to speak with 20 respondents from each community, since many herders were on migration and out of cell phone range. For Maharashtra, we were forced to adopt a slightly different method as movement restrictions made it difficult for us to access pastoralists.



Collecting information from Bakarwals in the Khunmoo area of Srinagar, Jammu and Kashmir. Picture credits: Zahid Parwaz Chaudhury



Visit with herders at Virudhunagar and Madurai districts, Tamil Nadu. Picture credits: Mathivanan M.



Visit with Raika herders in Rajasthan Picture credits: Maganlal Raika

The researchers in Maharashtra conducted focused group discussions with members of different communities and used the questionnaire to drive these discussions. Consequently, data from Maharashtra was not incorporated in the graphs that were generated for capturing trends.

We coded the qualitative data collected through interviews for converting it into tabular form. This tabulation enabled us to undertake simple calculations to estimate the proportions of herders reporting on a particular variable or experience and capture major trends in the findings. Ashish Gutthe, a research assistant at Pragati Abhiyan, was responsible for converting the qualitative data into tabular form and for further analysis. We collaborated with Srishti Films and Janastu for the digitisation of migration routes of pastoralists across all states. These relatively simple maps have been designed to provide, where possible, a bird's eye view of mobility as well as of the extent of each state territory used by these mobile communities. Each map has attempted to show migratory patterns in the state, with, where possible, either home locations or the summer/winter pastures used by herders. Information on migratory routes was provided by authors of the state reports, except Karnataka for which the relevant information was provided by Janastu.

## Limitations

This survey was conducted at a time when the lockdown was beginning to be gradually relaxed. As a result, it was not always possible to conduct interviews in person. Despite the restrictions on movements, in a few of our states, we did manage to conduct in-person interviews, for the rest, however, we had to depend on telephonic interviews. Another limitation of this study is that it captures the difficulties faced during the lockdown period. To that extent, this report provides insights on the immediate impact that the lockdown had on the lives of the pastoralists and does not necessarily explore the longer-term impacts on pastoralist lives or economies.

### Summary findings

The findings of this survey are broadly in line with the findings of our pilot study that was conducted in April 2020. They also reflect the findings of other similar studies (Mathai 2020, Biswal et al 2020) that have been conducted in the past year for examining the impact of the lockdown on pastoralists inhabiting different regions of India. The findings shared here and in the state reports are structured around the following themes:

Challenges in access to grazing and forage while on migration Challenges in accessing milk markets Challenges in accessing meat markets Shortage of labour Problems of shearing sheep Difficulties in accessing veterinary care services Difficulties in obtaining adequate ration Social Stigma

#### a.) Challenges in access to grazing and while on migration

Our survey showed that 78% of respondents were on migration during the lockdown. The impact of the lockdown was felt in varied ways by our respondents – 49% reported experiencing a positive impact of the lockdown on their movement, attributing it to the absence of traffic. While 35% of respondents experienced a negative impact, 16% did not experience any change in their movement. This variation is perhaps a result of the different ways in which the lockdown was enforced throughout the country.



Figure 1: Herder responses w.r.t. impact of lockdown on movement

Three main issues caused a negative impact on pastoralists' movements. First among these was the issue of restricted access in forest and protected areas. This was seen particularly in Uttarakhand and Maharashtra. Respondents in both states reported that they were harassed and, in some extreme instances, even beaten by state officials for accessing forest areas. Van Gujjars of Uttarakhand were prevented by the lockdown from embarking on their summer migration towards higher altitudes. Forced to stay at their winter pastures, they tried to access forage in Corbett National Park and Rajaji Tiger Reserve and decided to camp in those forests. Being forced to spend the summer at low altitudes was an additional source of stress for the animals, as they are used to spending their summers in cooler temperatures. The heat affected the productivity of the animals, resulting in reduced milk yield from the usual 6-7 litres/animal to 3-4 litres/animal. State officials continued to harass them throughout the lockdown with regard to movement, their presence within National Parks and Tiger Reserves, and on account of bringing vehicles carrying fodder for their animals into the forests. In Maharashtra, members of the Mathura Lambada community reported their movement was restricted by forest officials near Nanded, due to which they were forced to stay on farmlands outside villages. Members of the Nandgawli community of the state were unable to find cottonseed cake for their cakes due to movement restrictions. The lack of adequate fodder affected the productivity of their cows.

The second set of problems emerged from the suddenness with which the lockdown was imposed. Respondents reported they were forced to alter their usual migratory routes, delay their migration, and in more drastic instances, abandon the year's plans to migrate entirely. The lack of transportation also hampered the migration of livestock as some pastoral communities rely on vehicles for moving at least a part of their herds. And those who could access some form of transport were forced to spend more money than usual for this purpose.

Biswal J., Vijayalakshmy K., and Rahman H. 2020. Impact of COVID-19 and associated lockdown on livestock and poultry sectors in India, Veterinary World, 13(9): 1928-1933. And, Mathai J. (edited), 2020. Pastoralist's Life in Lockdown – A Study of Five States during COVID-19. Actionaid, Bhubaneswar.

The lack of transport facilities and few functional shops meant there was limited availability of fodder in the open market. Not surprisingly, this contributed to a sharp rise in fodder prices aggravating stresses on herders dependent on such market-based sources.

In states like Tamil Nadu and Jammu & Kashmir, migration was delayed by a couple of months. In Uttarakhand, the government banned the summer migration altogether due to which many herder families experienced considerable difficulties. In Maharashtra, pastoralists were required to produce E-passes while on migration within the state. And their inability to produce one was often used as an excuse by officials to harass them.

Himachal Pradesh appears to have been an outlier in proactively reaching out to state officials to ease the passage of sheep and goat herding pastoralists during the lockdown. The state government issued special permissions to pastoralists to facilitate their movement on the grounds that pastoralists tend to travel in small groups of 2-3 people rather than as large groups and graze their animals in open, and often, remote areas. All of these conditions were seen as inimical to the transmission of COVID-19 and enabled the government to make an exception for herders, despite the strict clampdown on movement announced by the government. However, buffalo herders of the state appeared to have experienced difficulties, particularly where they needed to cross the Punjab-Himachal border.

Finally, pastoralists had to contend with the problem of accessing fodder from market sources. This was a difficulty that continued to persist well into the lockdown even though the MHA had issued guidelines permitting the movement of fodder back on April 15th 2020. This is because markets continued to stay shut as several districts remained on the list of COVID-19 'hotspots'. The lack of transport facilities and few functional shops meant there was limited availability of fodder in the open market. Not surprisingly, this contributed to a sharp rise in fodder prices aggravating stresses on herders dependent on such market-based sources. The limited supply of fodder also had negative consequences for animal health and productivity.

#### b.) Challenges in accessing milk markets

Goat, camel, and buffalo herders normally sell milk either to household customers, dairies, or roadside tea stalls. Pastoral communities across states faced difficulties in selling milk during the lockdown, and, in some instances, even after the lockdown was lifted. Among our respondents, 26% reported facing difficulties in the sale of milk (refer to figure 2). Herders in Himachal Pradesh, Maharashtra, Rajasthan, Gujarat and Uttarakhand reported that they were unable to access their

of transportation.

normal channels to dispose of surplus milk. Though they were able to convert some of this into ghee and buttermilk to increase the shelf life of surplus milk, as the weather heated up, even these products had to be disposed of to avoid spoilage. In Gujarat, cow milk sellers had a hard time finding appropriate dairies to sell their milk to. Camel herders were unable to take their milk to the camel milk dairies due to lack In Himachal Pradesh, Gujjars who herd buffaloes were forced to sell milk at half price. Van Gujjars in Uttarakhand shared similar experiences of being forced to sell milk at lower prices. Their experience was particularly painful because they had to face the stigma of the 'Tablighi Jamaat rumour', which was a function of their religious identity as Muslims. Their usual buyers refused to purchase milk from them because of the fear of COVID 19 transmission generated by the 'Tablighi Jamaat' rumour spread through national media (refer to section on social stigma for details). The Gujjars and Bakkarwals of Jammu and Kashmir too faced difficulties in selling their milk - on account of markets being closed and lack of transportation. In both Uttarakhand and Maharashtra, herders were forced to throw away surplus milk as they were not able to sell it to their usual buyers. In Maharashtra, even though the dairies in the cities were functional, pastoralists could not reach those dairies due to the strict restrictions on movement. In Telangana and Andhra Pradesh sale of milk did not appear to be a problem as respondents there did not rear milch cattle.



Figure 2: Herder responses w.r.t. difficulties faced in the sale of milk and animals (percentage wise)

#### c.) Challenges in accessing meat markets

A total of 52% of the respondents reported facing difficulties while selling animals. Respondents from Gujarat, Maharashtra, Tamil Nadu, Telangana, Andhra Pradesh, and Jammu & Kashmir reported facing difficulties in selling animals due to the traditional markets being shut and the limited availability of local butchers. Given that the sale of animals constitutes a large share of income for shepherds, some were forced to sell their animals at lower prices to the few buyers that they could find. Table 1 below provides examples of declines in prices reported by herders across states.

State	Animal/produce	Regular Price (in INR)	Price during lockdown (in INR)
Gujarat	Sheep and goat	5,000	2,500
Tamil Nadu	Cattle	10,000	6,000
Maharashtra	Lamb	6,000	4,000
Jammu and Kashmir	Sheep and goat meat	600/kg	400-500/kg

Table 1: Fall in prices of animals and produce during the lockdown



Figure 3: Herder responses w.r.t. difficulties faced in the sale of animals (percentage wise)

Two additional reasons that made selling animals difficult were reported from the state of Maharashtra. First, the rumour that COVID-19 spreads through meat led to a dampening of demand for meat in the state. Second, the Tablighi Jamaat rumour made it difficult for Muslim traders to enter Dhangar villages, reducing opportunities for the Dhangars to sell their animals (refer to section on social stigma for details about the Tablighi Jamaat rumour).

It should be noted that sheep and goat herders were insured from the closure of markets to an extent as compared to those who sell fresh, perishable produce like vegetables and milk. This is because though some of them were forced to sell their animals at lower prices, others knew that they could wait for the markets to open and the prices to recover. This is perhaps reflected in figure 3 which indicates 48% of our respondents did not face any difficulties in selling animals. Finally, herders in the Deccan region were able to support themselves by generating an income through the sale of manure, an option that was lacking to the herders of the Himalayan and western regions.

#### d.) Shortage of Labour

We knew from the pilot study in April that pastoralists faced the problem of shortage of labour. In some instances, herders had returned home in February to attend to family functions or help with cultivation. Post the imposition of restrictions, these herders were unable to move to where their herds were, resulting in a significant shortage of labour in managing the herds. One of the recommendations that we had made earlier was that the return of pastoralists to their migratory sites be facilitated. Inability to return would have dire consequences for herd management.

Our findings in this report are broadly in line with those reported earlier. In both Andhra Pradesh and Himachal Pradesh, there were instances of labourers being stranded in far off places during the lockdown. In Telangana, herders spoke of labour being unable to join the herd due to restrictions on movement. The cattle herders of Tamil Nadu reported incurring an increased expenditure for hiring extra labour, at a time when their normal labour was unable to join the herd. They also spoke of the difficulties of having to pay more than normal to meet their labourer's food and fuel expenses. The Bakkarwals of J&K too reported they had to pay higher than normal wages to hired labour during the period. In Rajasthan, one respondent reported that the shortage of labour meant that women in the family had to take up a greater role for taking care of the animals, something that does not occur under normal circumstances. In Uttarakhand, very few of the respondents reported that they require the help of hired labour during normal times, and so this did not appear to be a major factor with regard to their experience of the lockdown. For most communities, however, the shortage of labour amounted to a problem of both herd management and a source of financial stress.

Twenty seven per cent of respondents could not access medicines at all, while the remaining 73% had to rely on private stores for buying medicines. Given that private stores sell medicines at a higher price as compared to public health centres, a majority of respondents reported spending much more on medicines than they do under usual circumstances.

#### e.) Problems with shearing sheep

Herders have to shear their animals to maintain their herds' health for which they are forced to hire extra labour as it needs to be completed within a specific time limit. It is normally carried out by individuals who are not a part of the herding community. Our pilot study showed that owing to the lockdown, shearers were unable to travel to where the sheep were located. This study has broadly supported these earlier findings. In Himachal Pradesh, despite the initial measures taken by the government to facilitate shearing, shepherds were forced to undertake shearing manually as shearers provided by the Himachal State Wool Federation were unable to reach them due to movement restrictions. In Gujarat, wool shearing became more expensive this year due to the restrictions on movement. The herders had to pay not only for the shearing services but also had to cover the costs of food for the professional shearers. In Maharashtra, the respondents belonging to the Kurumar community could not travel to the market where mechanical shears are available. This translated into a delay in shearing, preventing them from selling wool. Finally, the Bikaner mandi, which procures wool from large parts of north India, was not operational. This had consequences for the wool economy in its entirety.

#### f.) Difficulties in accessing veterinary care services

Respondents across states reported difficulties in accessing veterinary care services. Figure 4 provides a comparison of herder ability to access services during normal times and how these were affected by the lockdown. As can be seen, it was three times harder to access health camps and four times harder to access vaccination services during the lockdown as compared to normal times. Perhaps most strikingly, 43% of respondents reported being unable to access any veterinary services during the lockdown. This was six times harder than under normal circumstances. The key problem was that during the lockdown public veterinary services had shut or were functional for limited periods only. Twenty seven per cent of respondents could not access medicines at all, while the remaining 73% had to rely on private stores for buying medicines. Given that private stores sell medicines at a higher price as compared to public health centres, a majority of respondents reported spending much more on medicines than they do under usual circumstances. For instance, in Jammu and Kashmir, respondents had to buy Terramycin at Rs. 50, which under normal circumstances is available at Rs. 6 in government run medical stores.



Figure 4: Herder responses w.r.t. access to veterinary care services (percentage wise)

In Karnataka, lack of veterinary care services led to individuals suffering losses of up to Rs. 30,000, or much worse, the death of animals. In Tamil Nadu, shepherds had to incur higher expenses to buy deworming medicines for their sheep, which is an essential requirement for sheep throughout the year. As pointed out earlier, several respondents were unable to access any veterinary care services at all. In Andhra Pradesh, 66% of the respondents were not able to access veterinary services and only 27% could access medicines from public health centres. In Jammu and Kashmir, 50% of the Bakkarwals and 71% of the Gujjars were not able to access veterinary care services during the lockdown. In Uttarakhand and Rajasthan, 76% and 86% of respondents, respectively, were unable to access any veterinary services. The situation in Uttarakhand was offset to an extent by the fact that Van Gujjars also rely on their traditional knowledge of plants for treating the basic ailments of their animals. In Gujarat, most of the respondents relied on traditional medicines that pastoralists can administer on their own. The lockdown, therefore, did not make a substantial impact on their access to veterinary services. The only exception with regard to provisioning veterinary services was Himachal Pradesh where the state government took proactive steps to ensure that public veterinary services like dipping continued to function throughout the lockdown.

#### g.) Difficulties in obtaining adequate ration

From Jammu and Kashmir to Maharashtra, ration shops in all states were functioning for limited periods during the lockdown. The first two weeks of the lockdown were a particularly difficult time for herders in Himachal Pradesh as shop timings clashed with their animals' grazing time. They had to rely on their pre-existing social ties in villages to procure food. In Jammu and Kashmir, the erratic shop timings and premium rates charged by shop-owners forced herders to carry substantially greater supplies with them than is normally the case. Inevitably, this translated into higher costs. In Telangana, Andhra Pradesh and Karnataka, herders relied to a great extent on their social ties with the farmers and villagers to access some form of rations. However, pastoralists across the country also reported that villages that are normally welcoming were wary of potential transmission of COVID-19 and did not allow them to enter the village due to the mobile lifestyle of pastoralists. This added to their difficulties in accessing rations from shops located inside villages. However, the situation was better wherever herders had strong pre-existing ties with other communities.

Across states, there appears to have been limited government support by way of provisioning ration to pastoral communities. The respondents of Andhra Pradesh, Telangana, and Maharashtra shared that their families received the support that was announced by the government. This included a sum of Rs. 1000, besides groceries for a month. Given that the lockdown lasted for more than three months, this support was starkly inadequate. In Ladakh, the respondents who were BPL and AAY ration card holders received free rations throughout the lockdown. In Jammu and Kashmir, only a few Gujjar respondents reported they received grains at subsidised prices from the food and civil supplies department of the state government.

#### h.) Social Stigma

Pastoralists reported experiencing social stigma on account of both their religion and their nomadic lifestyle. Right from April onwards, Muslim Gujjars in Chamba, Himachal Pradesh, and from Rishikesh/Haridwar areas in Uttarakhand were reporting that they were being ostracised and had difficulty in selling milk. In both instances, there were rumours that their milk carried the coronavirus, so customers were advised to not buy their milk.



Figure 5: Herder responses w.r.t. social stigma (percentage wise)

In our survey, 25% of respondents reported experiencing some form of social stigma. These experiences were felt more acutely by respondents in Himachal Pradesh and Uttarakhand as compared to the Deccan and western regions (Refer to figure 6 below). In Uttarakhand, 19 of the 21 Van Gujjars spoken to reported that their long term customers refused to buy milk from them due to the fear of COVID-19 transmission from milk. As can be seen in figure 6, all of them faced discrimination on account of their religion – which occurred due to the Tablighi Jamaat rumour. According to the Tablighi Jamaat rumour participants of an Islamic congregation, the 'Tablighi Jamaat', held in New Delhi in February-March 2020, were dispersing across India to spread COVID-19. In reality, they were trying to reach their homes to avoid getting stranded in Delhi due to the lockdown that had been imposed suddenly.

The effects of this rumour played out differently in Maharashtra. There it was the Dhangars, who though not Muslims, had to bear its brunt. This is because they sell their animals to Muslim traders. Owing to the rumours, those traders were not permitted to enter the Dhangar villages, leaving them without any buyers, which forced them to eventually sell their animals at lower prices. Some pastoralists were also stigmatised on account of rumours suggesting that meat was a carrier of the COVID-19 virus.



Figure 6: Herder responses w.r.t. experiences of social stigma (in terms of number of respondents)

Social stigma due to the nomadic lifestyle of pastoralists being associated with the fear of COVID-19 transmission was reported from all the states. In states like Gujarat, Maharashtra, Uttarakhand, Himachal Pradesh, Jammu & Kashmir, pastoral communities were not permitted by villagers to enter villages while they were on their migration due to fears of COVID-19 transmission, preventing them from accessing the village commons. This also made it difficult for them to access supplies from local shops, besides affecting their businesses. In some instances, pastoralists were prevented from accessing water from the village wells too. On the other hand, in the southern states, the experience of social stigma was limited. Herders in Tamil Nadu, Karnataka, Andhra Pradesh, and Telangana reported that they faced stigma from the villagers due to their mobile lifestyle only in the initial phases of the lockdown. However, the situation soon improved for the herders as the villagers eventually relented. This was seen particularly in Telangana with 13 respondents reporting this.

This difference was possibly on account of the long term ties that exist between the farmers and pastoralists in the Deccan region, where pastoralists continue to pen their animals on farmer fields. The practice has reduced substantially in other parts of the country, with a corresponding reduction in farmer dependence on pastoralist communities. When herders found it difficult to get appropriate prices for their animals in states like Tamil Nadu, Andhra Pradesh, and Telangana, they relied on penning to sustain their daily expenses. These deep networks, therefore, acted as a source of much needed financial and social support for them. In Tamil Nadu, the farmers even played a crucial role in helping herders access forage for their animals by speaking with the villagers to allay their apprehensions about permitting the mobile pastoralists to enter the village commons. In Telangana, a unique barter system between shepherds and farmers played an important role during the lockdown. According to this system, shepherds give farmers lambs worth Rs. 12,000 and in exchange the farmers let the shepherds graze their flocks on the farmers' lands. In both Karnataka and Andhra Pradesh, there were similar instances of cooperation between the farmers and herders. The overall experience was thus better in the Deccan states than in the Himalayan and Western states.

### Conclusion —

Almost every aspect of Indian society was affected in one way or the other by the COVID-19 lockdown. But some sections of India's population had to bear a heavier brunt of the lockdown – especially those whose livelihoods are tied to mobility. As mentioned earlier, mobility plays a central role in pastoralism since this mode of life is driven by the need for finding quality and adequate seasonal forage for their animals. They were, therefore, naturally impacted by the lockdown. Some groups, of course, more than others depending on various local conditions.

At the time of writing this, India has recently witnessed its second wave of COVID-19 which was marked by an extremely high number of infections and deaths. A major difference between the first and second wave of COVID-19 was that the latter affected rural parts of India to a much greater extent than was true during the first wave. Some of the preliminary data that has emerged from CfP and its partner organisations' COVID-19 relief work for pastoralists during the second wave shows a dramatic increase in the spread of the disease compared with the first wave. For instance, data from Himachal Ghumantu Pashupalak Mahasabha indicates that the positivity rate in the Chota Bangahal area is as high as 30%, with significant medical and financial consequences. Ground reports from Uttarakhand indicated that the milk economy took a hit again due to a disruption in the sale and procurement of milk as well as in the procurement of fodder. In the Banni region of Gujarat, around 1000 cases of COVID-19 have been detected from an area consisting of close to 8000 households. While in Maharashtra, a shortage of medical supplies, rations, and veterinary care services was reported. In Telangana's Nagarkurnool district, 400 COVID-19 positive cases were reported in a single Gram Panchayat by our partner organisation. The lockdown imposed during the second wave led to a dire lack of medicines, awareness, ration, and disruption in livelihoods. Since such lockdowns are likely to happen with each wave of COVID-19, we present the following recommendations for the government for safeguarding pastoralists during such periods:

According to the criteria published by the WHO in May 2020, a positivity rate of less than 5% indicates that the spread of COVID-19 is under control in a country. See https://ourworldindata.org/coronavirus-testing

## Key Recommendations –

1. Pastoralism as a sector needs to be exempted from the lockdown: This can be along the lines of the orders passed by MoHA exempting agricultural activities and the collection of minor forest produce from the lockdown. This means that pastoralist communities should be supported in continuing their out migrations, ensuring adequate access to critical grazing resources at this very difficult juncture, and ensuring support concerning the marketing of their products as essential commodities.

2. Ensuring access to grazing: During the first lockdown, as well as during this second lockdown, the MoEF issued orders prohibiting access to protected areas on the grounds that such access could result in human to wildlife transmission of COVID-19. Given there is minimal contact between humans and wildlife this is an unlikely scenario, but its implementation has significant consequences for pastoral Pastoralist communities should be supported in continuing their out migrations, ensuring adequate access to critical grazing resources at this very difficult juncture, and ensuring support concerning the marketing of their products as essential commodities. This report attempts to capture some of the core problems that pastoral communities have experienced during and following the COVID-19 induced national lockdown imposed in March 2020. communities. These communities have legal rights for grazing and seasonal access to resources both for settled and transhumant communities under the Forest Rights Act (Sections 2 (a), 3 (1) (d) and 4 (1)). The Ministry of Tribal Affairs needs to engage with state governments to ensure that these rights are not restricted during or as a result of the lockdown. The ministry can issue an advisory to concerned state governments to take actions to remove restrictions imposed on grazing and access to forests. It can also extend support to the pastoralists to exercise their rights following the required conditions of social distancing. At the same time, state governments should be asked to ensure recognition of rights of pastoral communities as per FRA as tenure security can be effective in strengthening their livelihoods.

**3. Access to Protected Areas:** Where pastoralists have been living in and using Protected Areas, their access to these areas should be ensured as their legal rights and access are recognised by the FRA.

4. Ensuring annual/ seasonal migrations: As has been done by Himachal Pradesh, pastoralist communities need to be supported to undertake their annual migrations. This is particularly true for communities that spend the summer at a high altitude since they have exhausted their forage in the winter grazing grounds and their animals are unable to tolerate the heat of the plains.

#### 5. Ensuring availability of fodder: Settled pastoral

communities require fodder. In the same way that the state is making food available to citizens, it needs to ensure that adequate supplies of fodder are available to pastoralists should there be an expressed need for the same. The prices of fodder should be regulated to ensure that pastoralists do not have to incur higher expenses due to the exorbitant rise in the prices of fodder in the open market.

6. Ensuring access to safe passage: Pastoralists, especially in mountain regions like J&K, need to be provided safe passage over bottlenecks and checkpoints. Their safe and speedy movement needs to be prioritised. This can be done by asking the forest department to remove the procedural requirement of permits for the movement of pastoral communities and livestock. This is in line with the FRA which provides that such rights shall be conferred free of any encumbrances and procedural requirements. Sheds for people and animals could be installed near such vulnerable points to ease the movement of communities. 7. Obtaining adequate ration: For the most part, pastoralists are at some distance from human habitation and so do not represent a transmission threat of any kind. They are, however, dependent on local communities or the government for their ration. Dedicated sets of teams need to identify the locations of pastoralists while on migration, and during the lockdown, to supply them with the provisions they need. Civil society may be in a good position to coordinate with pastoral communities, and thereby identify locations where such support may be provided. 8. Resolving labour shortages: The return of pastoralists and their hired labour to migratory sites needs to be facilitated so that they do not face the problem of labour shortages.

9. Ensuring appropriate access to markets: Governments are treating farm produce as essential services and are accordingly making arrangements to ensure that farmers can get their produce to the market. Milk and meat produced by pastoralists need similar categorisation as an essential service, and efforts must be made to ensure pastoralists can access mainstream markets to sell their milk and meat. District administrations need to ensure that local misgivings regarding milk and meat as a carrier of Coronavirus are alleviated.

10. Shearing of Sheep and Procurement of Wool: Departments of Animal Husbandry of the State Governments need to provide shearing services and undertake wool procurement and storage on a large scale. This is both to compensate for the potential drop in wool imports and provide relief revenue to pastoralists who have seen a drop in revenues from the sale of milk and meat. State governments must invest in wool procurement for the next twelve months to prevent a complete collapse of the local wool market.

11. Health check-ups and adequate health facilities: Testing for Coronavirus needs to be undertaken for all pastoralists, particularly those who are on migration. If their test results are negative, they need to be provided medical certification to that effect. They will then be able to show these at checkpoints as well as in villages along their migratory routes. This should go a long way towards minimising the social stigma that pastoralists are currently experiencing. Basic medical facilities like masks, medicines, and sanitizers must be provided in sufficient quantities to pastoralists, no matter how remote an area they may be living in. Oxygen cylinders should be made available in all the primary health centres in rural areas from where pastoralists may access them. Basic medical facilities like masks, medicines, and sanitizers must be provided in sufficient quantities to pastoralists, no matter how remote an area they may be living in. Oxygen cylinders should be made available in all the primary health centres in rural areas from where pastoralists may access them. 12. Veterinary care needs to be made available to pastoralists: Availability of vaccinations and free medicines for animals must be ensured to pastoralists. The animal husbandry department of state governments should take steps to ensure the continuation of support for the schemes that are underway for livestock breeding through artificial insemination.

13. Health messages: Advisories to pastoralists and migratory communities need to take into account their context and availability of water. Frequent washing may be impossible for them, but sanitizers should be made available to them.

14. Mobile services: Many of the issues pointed above can be mitigated if respective governments also become more mobile and fluid by engendering flexible mobile field offices related to health, education and veterinary care and putting IT to greater use.

Many of the organisations that participated in this study are in touch with pastoral communities in different parts of the country. Organisations from Himachal Pradesh, Uttarakhand, Telangana, Maharashtra, Gujarat and Tamil Nadu were actively involved in providing support (rations and health care) or facilitating such support by interfacing with the government. These and other civil society organisations across the country would be in a position to provide such an interface in the future.

### Annexure I

Summary of findings from telephonic survey undertaken by CfP in April 2020

#### 1. Restrictions on movement:

Pastoralist migrations were halted by state governments either temporarily or for the entire year, on the assumption that all movement held the potential for transmission of the virus, and hence represented a threat to communities that pastoralists interacted with. In some instances, pastoral communities were able to convince governments to permit them to continue with their migrations. Others, such as the Van Gujjars of Uttarakhand, were banned from moving to their summer pastures for the entire year and were forced to either stall feed their buffaloes or find alternative grazing arrangements within the lower altitudes. Both cases resulted in higher costs but also significantly reduced animal productivity. The Himachal government was particularly proactive in supporting pastoralist movement, on the grounds that for the most part herders travel alone and tend to spend time in relative isolation, reducing the likelihood of viral transmission.

#### b) Accessing markets:

Pastoralist communities from across states spoke of the difficulties of accessing milk, meat and feed markets, all closed due to the national lockdown. Some surplus milk was converted into ghee and buttermilk, but as the weather warmed, even these products needed to be disposed of to avoid spoilage. The closure of meat markets had implications for immediate cash flows but did not represent the loss of a crop, such as may have been experienced by milk-selling pastoralists or by farmers with perishable, fresh produce.

#### c) Shortage of Labour:

In some instances, herders had returned home in February to attend to family functions or to help with cultivation. Post the imposition of restrictions, these herders were unable to move to where their herds were, resulting in a significant shortage of labour in managing the herds. Many herders also reported instances of hired labour choosing to return home, owing to the limited information available on the pandemic and the associated desire to be close to home during this period of uncertainty.

#### d) Shearing sheep:

Sheep need to be sheared just before the onset of summer and this is generally undertaken by shearers not necessarily part of the herding community. When sheep are not shorn ahead of the summer heat, there are heightened levels of sickness within the herd. Owing to the lockdown, shearers were simply unable to travel to where the sheep were located. While the Himachal government was ultimately able to facilitate shearer travel to the herds, shearing operations were badly impacted in most states. Many herders spoke of the likely impact of the lockdown and its aftermath on the import of wool and the export of woollen carpets and durries.

#### e) Obtaining ration:

Pastoralists on the move normally obtain rations from village kirana shops or shops in small towns. Pastoralists across the country spoke of the fact that villagers, normally welcoming, were wary of potential transmission of COVID and were often unwilling to have transient pastoralists enter the village. In instances where the state was providing ration, pastoralists tended to miss out because they were on the outskirts of villages or were grazing their animals at some distance from human habitation.

#### f) Social Stigma:

Pastoralists from various parts of the country reported that they experienced a great deal of social stigma on account of their religion or their nomadic lifestyle. Gujjars in Chamba, Himachal Pradesh, and from the Rishikesh/Haridwar areas in Uttarakhand faced ostracism as minorities and had difficulty in selling milk and in embarking on their annual migrations. In both instances, there were rumours that their milk carried the coronavirus, so customers were advised to not buy their milk. Pastoralist mobility in itself has been a cause for social stigma for many decades and reports from across the country indicate this was accentuated throughout the lockdown.

#### g) Pastoralism, Resilience and COVID-19:

Several pastoralists mentioned that they may have experienced fewer negatives resulting from the lockdown than many other with rural livelihoods. This is likely linked to the fact that pastoral communities have historically needed to adapt to climatic, political, and other changes. Pastoralist adaptability may have played a role in mitigating to some degree the various issues listed above.

### Annexure 2 –

Questionnaire to understand how pastoralists have fared under COVID-19

Code (State letters, followed by 1st three letters of Community name, followed by serial number of interview, in two digits - e.g. GUJRAB01)

Interviewers name	Date
a. Name	b. M/F
c. Community	d. Phone #
1. Home Location	2. Current Location
3. Aadhaar Card Y/N	4. Bank account Y/N
5. Migratory Y/N	6. Owner/helper?
7. Are you with the herd Y/N	8. What animals do you manage?
9. Herd size	10. Were row protein during

On each of the following please describe your normal practice and how this is affected because of the COVID epidemic:

#### A. Obtaining forage/water

1. What is your normal pattern of migration at this time? Do you cross district or state boundaries?

2. Has your movement been interrupted this year? Positively/Negatively? 3. Where have you obtained forage and water this year (village commons, Forest Department land, Protected Area, cultivated land, purchased, others?)

4. Do you normally purchase fodder? Were you able to do so this year?

### B. Revenues/Expenditures

1. During lockdown have you had difficulty in the following: a) Sale of milk and milk products

- b) Sale of animals c) Sale of wool i) Difficulties with shearing? ii) Getting wool to markets?
- d) Penning

2. Has COVID/lockdown caused a fluctuation in the rates you receive for produce? 3. Where have these expenses changed (medicines, food, water, transport, alcohol, labour)? 4. Has COVID had an impact on your earnings? A bit. Medium. A lot

### C. Labour

1. What is the normal labour requirement? How much of this is hired labour? 2. What is the situation during lockdown? (could not come, had to leave, stranded?)

#### D. Veterinary care

1. What are the normal veterinary services that you access? Health camps, doctors, medicines, vaccinations? 2. Are these services available during lockdown?

#### E. General Questions (Rations, health care, places to stay, social stigma)

1. Where do you normally get your rations while on migration?

2. What difficulties have you encountered because of the lockdown?

3. What state or other support has been available to ensure you have adequate ration?

4. Were you required to carry a Coronavirus free certificate? Where all were you required to show such a certificate? Did you need permission to move?

5. Have you experienced difficulties in finding places to camp during the lockdown?

6. Have you experienced social stigma? Please elaborate?

#### F. Open-ended

1. During COVID have you been better off or worse off than other rural communities (agriculture, settled livestock keepers)... Can you compare your situation with others from your community who have moved out of herding?

2. What are your hopes and fears with regard to the next 6-12 months? 3. Do you have anything to add?

G. Additional Comments by interviewer

### Annexure III

#### About Sahjeevan and the Centre for Pastoralism

Sahjeevan was started in the late 1990s with a broad mandate of working on environmental issues in Gujarat. Over the past three decades, the organisation has worked on environmental conservation from a variety of perspectives, including drinking water security, decentralized biodiversity conservation, solid waste management, and grassland conservation. Sahjeevan has increasingly focused its work at the interface of pastoralism and conservation, with initiatives aimed at building pastoral livelihoods, securing improved pastoralist access to traditional grazing resources, obtaining mainstream recognition for the role played by pastoral communities in developing animal breeds, and in undertaking scaled pilots aimed at restoring the iconic Banni grassland of Kachchh. Sahjeevan has recently helped launch the Centre for Pastoralism with a mandate of building partnerships within government, industry, academia, and civil society towards expanding our collective understanding of and responses to pastoralist concerns.

Approximately 20 million pastoralists graze India's forests, grasslands, and farm fallows. They are a familiar sight by the roadside as they migrate between summer and winter grazing grounds, often over hundreds of kilometres. Their many contributions have rarely received the recognition they deserve as mainstream society has tended to see them as relics of an outdated way of life. They are "keepers of genes", custodians of India's remarkable animal diversity; they are significant contributors to our dairy and meat industries and; their music and crafts find resonance and expression in much of what we consider mainstream culture. Perhaps most critically, pastoralist mobility, as an adaptive response to the climatic extremes they experience, marks them out as communities particularly well adapted to a changing climate regime. The Centre for Pastoralism hopes to collaborate with government, industry, academia. and civil society to undertake research aimed at enhancing our understanding of pastoralist ecosystems, develop programs aimed at enhancing livelihood security, and anchor outreach activities to educate the wider society about pastoralist contributions to the mainstream.



Centre for Pastoralism