



Food and
Agriculture
Organization

Drought: The Latest Blow to herding Livelihoods 23 January 2008



Office for the
Coordination
of Humanitarian
Affairs

KEY OBSERVATIONS

- Herders depend on rainwater for three reasons:
 - Drinking water for domestic use and flocks
 - Growth of vegetation on grazing land
 - Growth of crops for domestic nutrition and animal fodder.
- This winter the eastern Mediterranean region, especially the occupied Palestinian territory (oPt), Israel and Jordan has experienced a serious drought.
- Livestock farming in the West Bank was already under serious stress before the drought began due to restricted access to range land, settler activity, increased price of water and fodder and a drop in market demands.
- Years of stress on the livestock sector has driven herders into a cycle of increasing debt and deepening poverty.
- Many herding families live in Area C where Palestinian development is restricted and subject to a rigid permit system. In 2007 OCHA recorded the demolition by Israeli authorities of 90 dwellings and 101 other buildings, the majority of which were for lack of building permits.
- The current drought has significantly increased existing stress and herders have often no choice but to reduce their flock by selling sheep and goats.
- Most seriously affected have been those families who are entirely dependent for their livelihoods on herding, especially Bedouin groups.

BACKGROUND

Livestock farming through grazing small ruminants (sheep and goats) has been a source of livelihood in this region for centuries. Before the beginning of the second Intifada in 2000 this branch of agriculture brought in 8.5% of the Palestinian GDP. In the 2005-06 season sheep and goat meat contributed 119 million USD to the West Bank economy and milk and milk products contributed 87 million. However, the viability of this livelihood is under severe threat due to the following factors:

- Nearly 30% of land in the land area of the West Bank is inaccessible for herders because it lies within IDF military zones (21%), or Israeli-declared nature reserves (8.7%).
- Israeli presence and infrastructure in the West Bank (settlements, Israeli cultivated land, roads, checkpoints, security installations).
- Denial of access to traditional range land by the Barrier.
- Degradation of remaining range land due to over-grazing.
- Rapidly increasing fodder prices (nearly 300% in the past year).
- General decline in the oPt economy (GDP dropped 10% in 2006).
- Minimal veterinary and advisory services provided by the PA Ministry of Agriculture.
- Lack of knowledge of farm management techniques that are required for farming on the recently restricted range land.

- Lack of suitable production and marketing management techniques among herders to increase the market value of milk and cheese.
- High abortion and animal mortality due to limited range of vaccinations and poor flock nutrition.
- Lack of alternatives and livelihood diversification due to restriction of access to the labor market in Israel
- Difficulty accessing drinking water for people or animals and the high cost of trucked water.

Many of the herders live in Area C, i.e., those parts of the West Bank that are under Israeli military and civil control. Therefore, their dwellings and animal shelters are often built without Israeli permission and for that reason are under threat of demolition. In Area C it is virtually impossible to get the required Israeli building permits for new dwellings or basic infrastructure (e.g. pipelines).

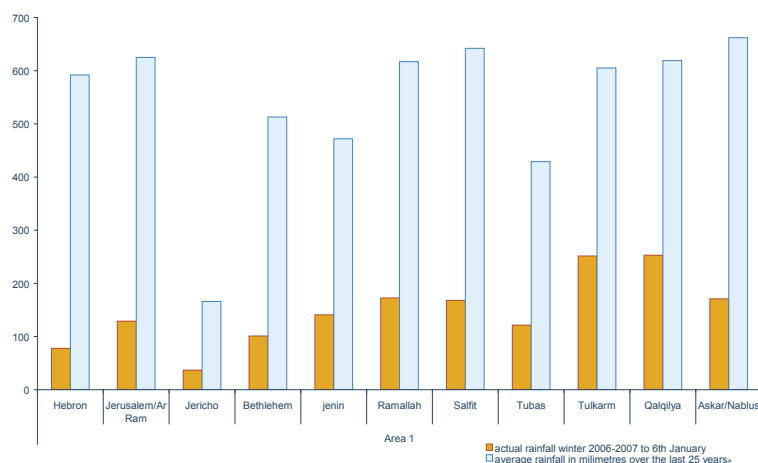
CURRENT SITUATION

In a normal winter, rain begins falling around mid-November. Therefore, grazing plants and crops grow while the soil temperature is still relatively warm. After December, the soil temperatures drop substantially and as a result no vegetation growth is possible.

The 2007-08 winter has seen a drastic drop in rainfall for the entire West Bank. The average rainfall has been 26% of the expected amount (based on average annual rainfall); ranging from 42% in Tubas, to 21% around Jerusalem and down to 13% of expected rain in the Hebron area. The most arid areas to the east along the Jordan Valley and the eastern slopes region are not monitored, but it is reported that these areas have had even less of their expected rainfall.

Observations show that grazing plants have not grown in the most affected areas, nor have feed-crops grown where they have been sown.

2007 Rainfall by Governorate



Grain is used as animal fodder to complement grazing, but fodder prices tripled in the past 12 months. One ton now costs 1,850 NIS (US\$ 500) whereas one year ago it was 850 NIS (US\$ 230). Many herders have fallen into deep debt to fodder merchants in an effort to maintain at least some of their flock. These steep price increases mean that each sheep or goat became a financial liability. Net losses amounted to up to 20 Jordan dinars (JD) or US\$ 28.5 per head in 2007. Sheep prices have dropped; a breeding ewe was worth 105 JD (US\$ 73.5) last season and is worth 65 JD (US\$ 45.5) in early 2008. If herders sell their flocks it

will be impossible for them to buy back into herding. Moreover, livestock is the only security herders have enabling them to access credit.

Most herding communities do not have water networks whilst others have networks, but often with no water pressure. Many rely on underground cisterns that are filled by rain water if there is any rainfall, or by water brought in by trucks. Israeli imposed road closures force Palestinian trucks to travel longer distances to deliver water and consequently the cost of transport for water has also increased. Trucked water costs 20-30 NIS/m³ and even more in remote places.



Sheep attempting to graze on drought affected land in south-east Hebron, January 2007. If sufficient rain had fallen a barley crop would be maturing in the field in the foreground and the hills behind would be covered in the green of essential grazing plants.

IMPACT OF THIS SEASON'S DROUGHT

The drought has had the most serious impact on the herd-dependent communities in the southern and south-eastern Hebron Governorate, the arid slopes east of Bethlehem and Jerusalem, and the Jordan Valley (no less than 2500 households).

Families in these communities, and to a lesser extent herders everywhere in the West Bank, face deepening poverty and food insecurity, they are heavily in debt and therefore are under increasing pressure to sell their livestock. Most herders report that even if they sold all their sheep at current prices they would not be able to clear their debts. Selling up would also mean they would have no source of future income. Prices for good quality barley fodder are at record high levels and cheaper alternative types of feed cause animal malnutrition resulting in a variety of health problems including high abortion and young lamb mortality rates. In addition to fodder, sheep need plentiful water and as the drought continues extra water must be bought.

Field monitoring by OCHA in early January 2008 revealed hundreds of families subsisting on bread and oil, supplemented by occasional vegetables when affordable. Many live in corrugated tin shacks or tents without the money to buy any type of heating fuel.

FUTURE PROSPECTS

Unless there is immediate support to herders with subsidized feed and water, many will be forced out of herding and the livelihood system that has supported them for centuries will be lost. They will no longer use traditional grazing lands and thus risk losing access to them. In the longer term herders must adapt their farming system to prevailing constraints through intensified flock management in parallel to enhanced veterinary services and improved marketing. Longer-term livelihood diversification is needed but this will depend on capacity building, skill diversification and alternative job opportunities.

If herding as an option is not maintained, the majority of herding families will join the long aid lists. Given the limited skill range of most of the herders, the high levels of unemployment and general economic recession, the likelihood of such families returning to economic independence in the fore-seeable future is slight.