

POSTHARVEST LOSS ASSESSMENT OF ORANGE FLESHED SWEET POTATOES IN RWANDA – BRIEF

Orange Fleshed Sweet Potato (OFSP) is primarily grown as a livelihoods/food security crop with a strong nutritional component. Sweet potatoes in general (white and yellow fleshed varieties) are an important crop for Rwanda, particularly for food security.

Orange Fleshed Sweet Potato losses

FROM FARM TO MARKET IN RWANDA



Causes of Postharvest Losses in Photos



This brief is made possible by the generous support of the American people through the United States Agency for International Development (USAID). The contents are the responsibility of the Horticulture Innovation Lab's Reducing Postharvest Losses in Rwanda project and do not necessarily reflect the views of USAID or the United States Government.

Summary of postharvest losses and quality problems

<p>Damage during Harvest</p>	<ul style="list-style-type: none"> • Traditional hoe harvest techniques can be very damaging. Once cut, if not cured, the tuber becomes more susceptible to degradation and insects • Rough handling • Farmer cash flow issues may result in early harvesting, leading to a poor-quality product (immature roots are too fibrous) • Farmers' use stagnant water to wash the tubers. This can induce fungal diseases.
<p>Postharvest Handling</p>	<ul style="list-style-type: none"> • Rough handling leads to bruised and damaged skin of OFSP. OFSP is harvested by a hoe that cuts the produce. Workers move the produce from one point to the other on the field while sorting, loading, unloading and transport on their heads. Handling damage lowers the shelf life. • Weevil and other pest infestation due to cracking
<p>Storage</p>	<ul style="list-style-type: none"> • Low use of adapted “curing” • Farmers use traditional practices such as storing in the ground or covered by grass, that require assessment • A CIP model storage solution (zero energy) was made of brick to protect against theft and was therefore expensive
<p>Transportation</p>	<ul style="list-style-type: none"> • Accidents on bikes or while carrying loads on heads are common • Distance to travel is far and hilly terrain increases difficulties with transport

Recommendations for Reducing Postharvest Losses

<p>1</p>	<p>Training of trainers (capacity building) in improved practices. Farmers should be trained in maturity and quality indices, postharvest handling, curing, long-term storage and use of improved containers. In general, training on production, harvest and postharvest best practices is required. Target lead farmers and incorporate them into training and capacity building mandate</p>
<p>2</p>	<p>Demonstrations that are recommended for the Postharvest Training and Services Centers on cost effective practices for reducing postharvest losses include:</p> <ul style="list-style-type: none"> • Use of improved containers for transport and marketing (smaller sizes, stackable baskets, plastic crates) • Small-scale processing methods • Zero energy cool chamber (ZECC) • Hygiene and food safety
<p>3</p>	<p>Postharvest agri-business opportunities should be promoted. These include:</p> <ul style="list-style-type: none"> • Entrepreneurial and business training for large scale farmers and vine multipliers (private sector) • Investigate feasibility / needs of assembly points and collection centers, and their potential to be privately run • Catalyzing entrepreneurs to provide postharvest storage and management services including packaging, handling, cooling technology and better transportation. • Local manufacture of OFSP based products • Smallholders need training on farming as a business

